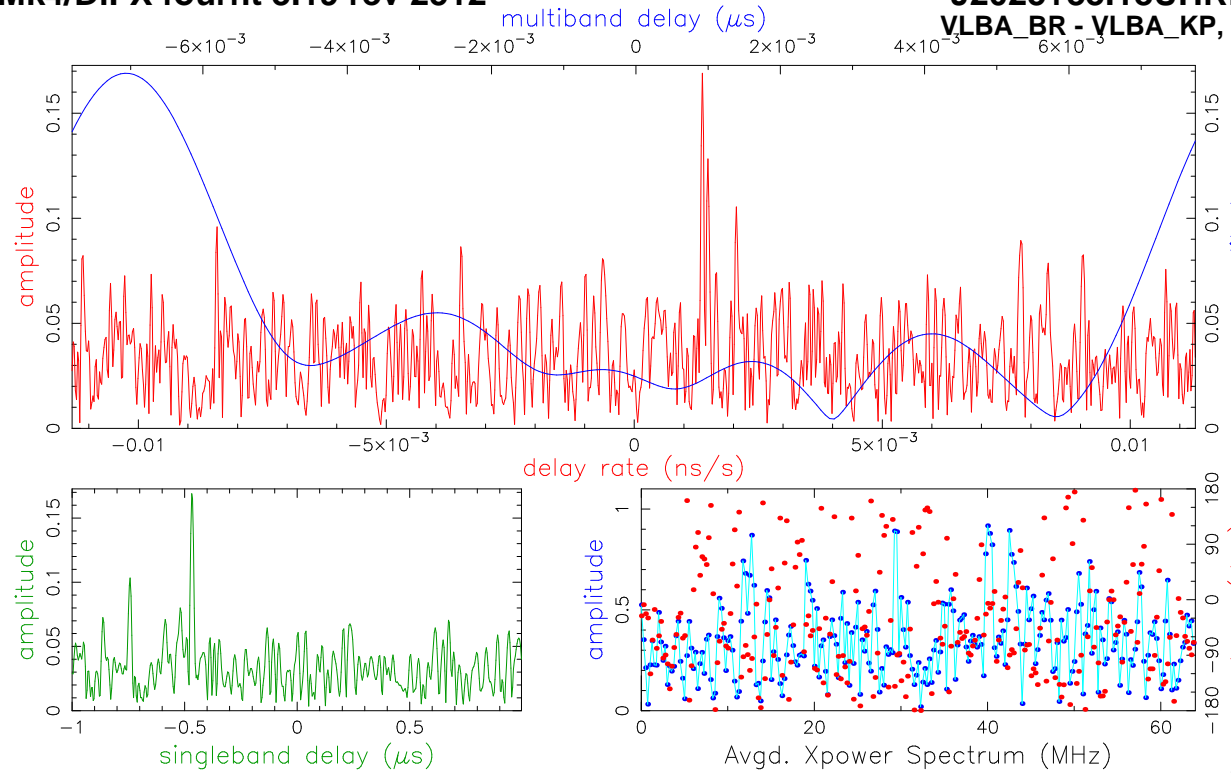


Mk4/DiFX fourfit 3.19 rev 2512

J2025+33.18UHRL, No0058, bk VLBA\_BR - VLBA\_KP, fgroup W, pol RR

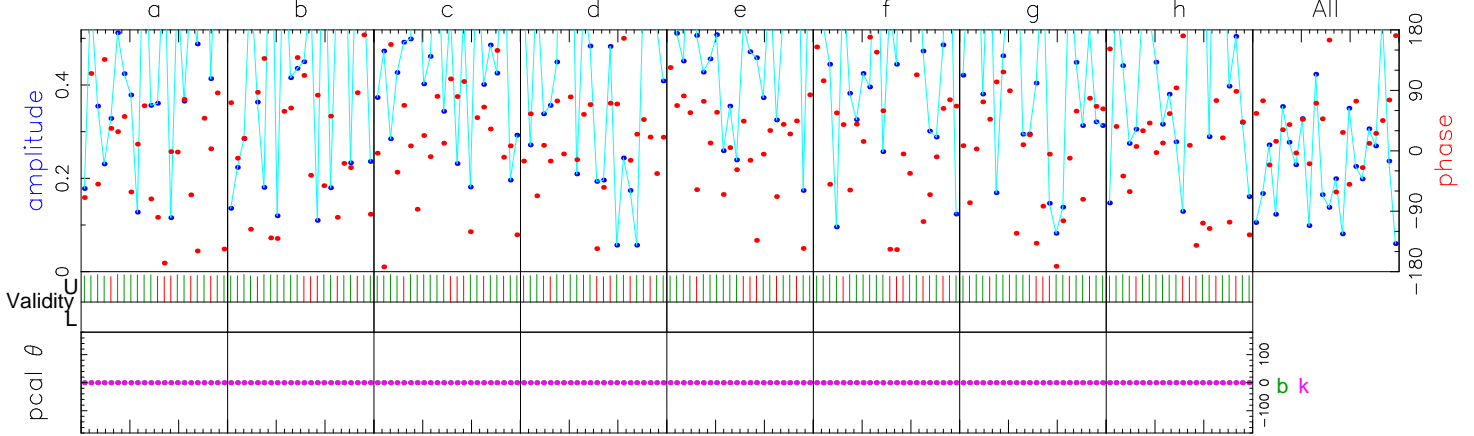


Fringe quality 0

SNR 6.2  
 Int time 173.832  
 Amp 0.173  
 Phase 29.3  
 PFD 7.7e-02  
 Delays (us)  
 SBD -0.467229  
 MBD -0.007030  
 Fringe rate (Hz) 0.117768  
 Ion TEC 0.000  
 Ref freq (MHz) 86140.0000  
 AP (sec) 0.512

Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090000.00  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build 2020:198:173855  
 2020:199:143633  
 2020:014:135814  
 RA & Dec (J2000) 20h25m10.842106s +33°43'00.214364"

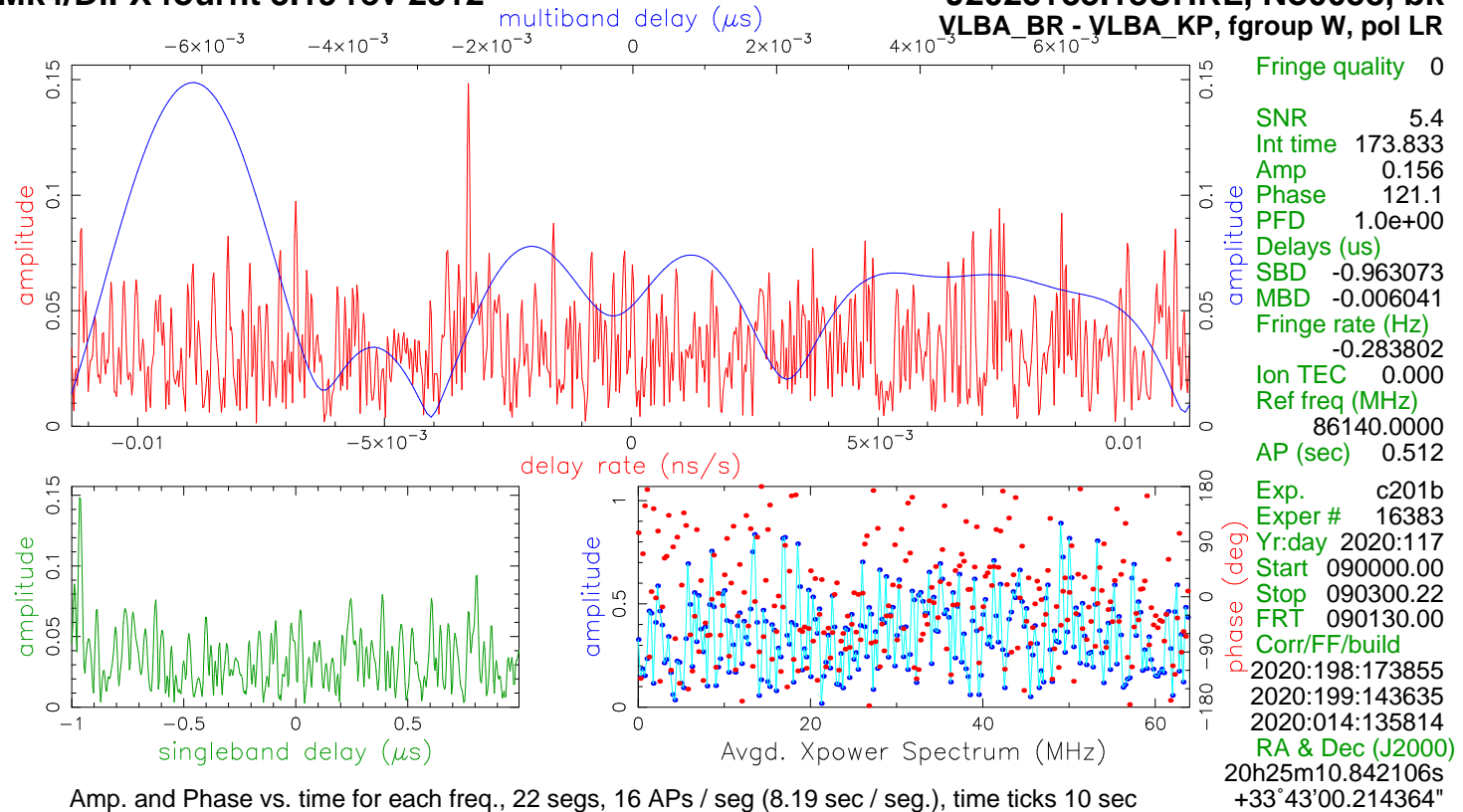
Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



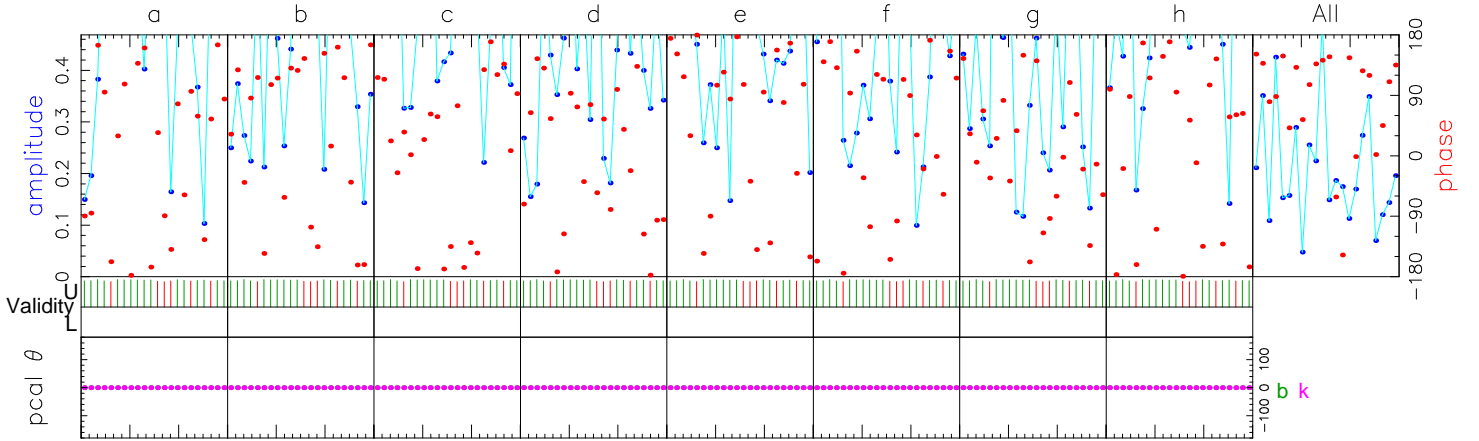
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
b	1000	1000	1000	1000	1000	1000	1000	1000		
k	1000	1000	1000	1000	1000	1000	1000	1000		
b:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
b:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
b	1000	1000	1000	1000	1000	1000	1000	1000		
k	1000	1000	1000	1000	1000	1000	1000	1000		
b	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
Group delay (usec)(sbd)	-2.46696344140E+02				-2.46236189531E+02				-7.02961E-03	+/- 1.8E-04
Sband delay (usec)	-2.46703418031E+02				-1.0636593E+00				-4.67229E-01	+/- 1.4E-03
Phase delay (usec)	-2.46236188586E+02				-4.7400004E-08				9.44770E-07	+/- 6.0E-07
Delay rate (us/s)	-1.78413153970E-01				-1.78414521145E-01				1.36717E-06	+/- 5.7E-09
Total phase (deg)			-102.5		1.48088643584E-05				29.3	+/- 18.5
	RMS	Theor.	Amplitude	0.173 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5				
ph/seg (deg)	56.9	43.4	Search (1024X32)	0.165	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000	1.000		
amp/seg (%)	77.2	75.8	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	mb window (us)	-0.008	0.008	
ph/frq (deg)	20.8	26.2	Inc. seg. avg.	0.184	Sample rate(MISamp/s): 128		dr window (ns/s)	-0.011	0.011	
amp/frq (%)	51.0	45.7	Inc. frq. avg.	0.158	Data rate(Mb/s): 2048	nlags: 256	t_cohere infinite	ion window (TEC)	0.00	0.00

b: az 74.4 el 33.0 pa -50.7 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 1242.704 2356.674 simultaneous interpolator

Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/bk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/bk.W.15.18UHRL

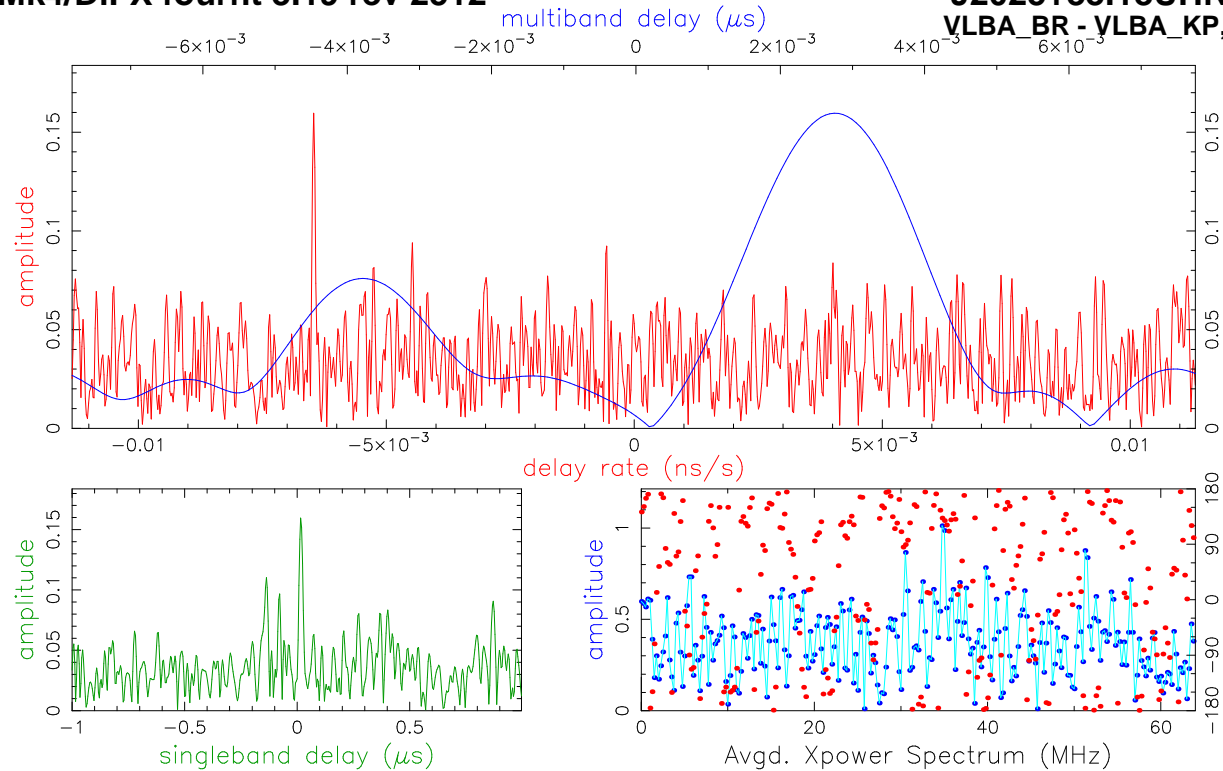


Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



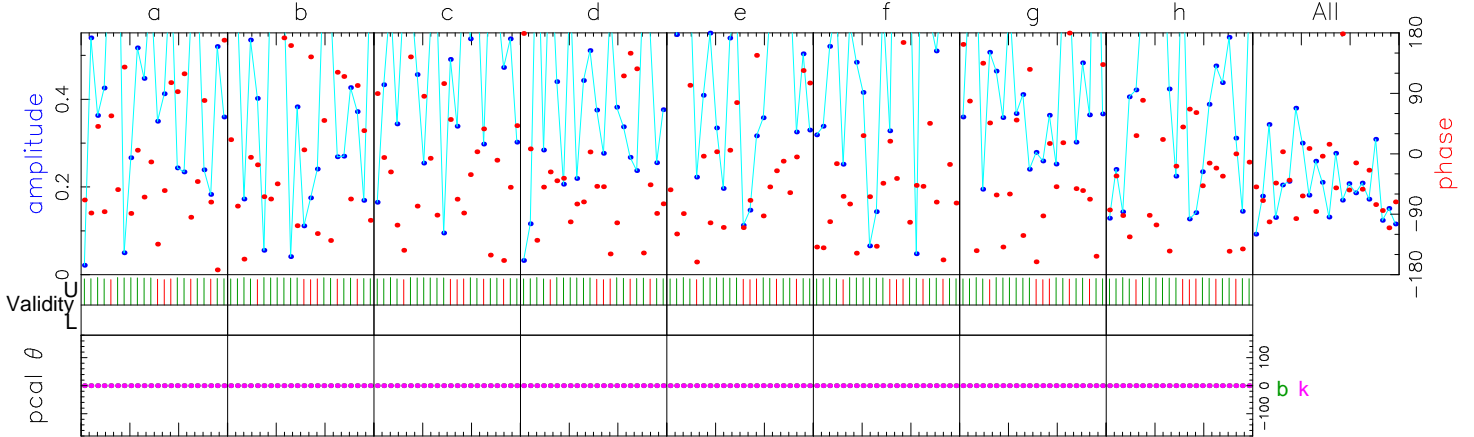
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
122.9	141.1	103.0	54.1	143.2	136.0	15.8	129.7		Phase	121.1
0.2	0.2	0.2	0.0	0.2	0.2	0.2	0.2		Ampl.	0.2
255.5	73.1	403.2	474.9	395.1	385.7	95.7	431.4		Sbd box	10.5
U/L 352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		APs used	
b 1000	1000	1000	1000	1000	1000	1000	1000		PC freqs	
k 1000	1000	1000	1000	1000	1000	1000	1000		PC freqs	
b:k 0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		PC phase	
b:k 0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		Mani PC	
b 1000	1000	1000	1000	1000	1000	1000	1000		PC amp	
k 1000	1000	1000	1000	1000	1000	1000	1000			
b W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		Chan ids	
k W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-2.4719535898E+02		Apriori delay (usec)	-2.46236189531E+02	Resid mbdelay (usec)	-6.04137E-03	+/-	2.0E-04		
Sband delay (usec)	-2.47199262781E+02		Apriori clock (usec)	-1.0636593E+00	Resid sbdelay (usec)	-9.63073E-01	+/-	1.6E-03		
Phase delay (usec)	-2.46236185627E+02		Apriori clockrate (us/s)	-4.7400004E-08	Resid phdelay (usec)	3.90397E-06	+/-	6.8E-07		
Delay rate (us/s)	-1.78417815808E-01		Apriori rate (us/s)	-1.78414521145E-01	Resid rate (us/s)	-3.29466E-06	+/-	6.5E-09		
Total phase (deg)		-10.8	Apriori accel (us/s/s)	1.48088643584E-05	Resid phase (deg)	121.1	+/-	21.1		

ph/seg (deg) 64.7 49.4 Search (1024X32) 0.148 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 84.1 86.2 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 53.4 29.8 Inc. seg. avg. 0.160 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 44.3 52.0 Inc. frq. avg. 0.167 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 b: az 74.4 el 33.0 pa -50.7 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 1242.704 2356.674 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/bk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/bk.W.22.18UHRL



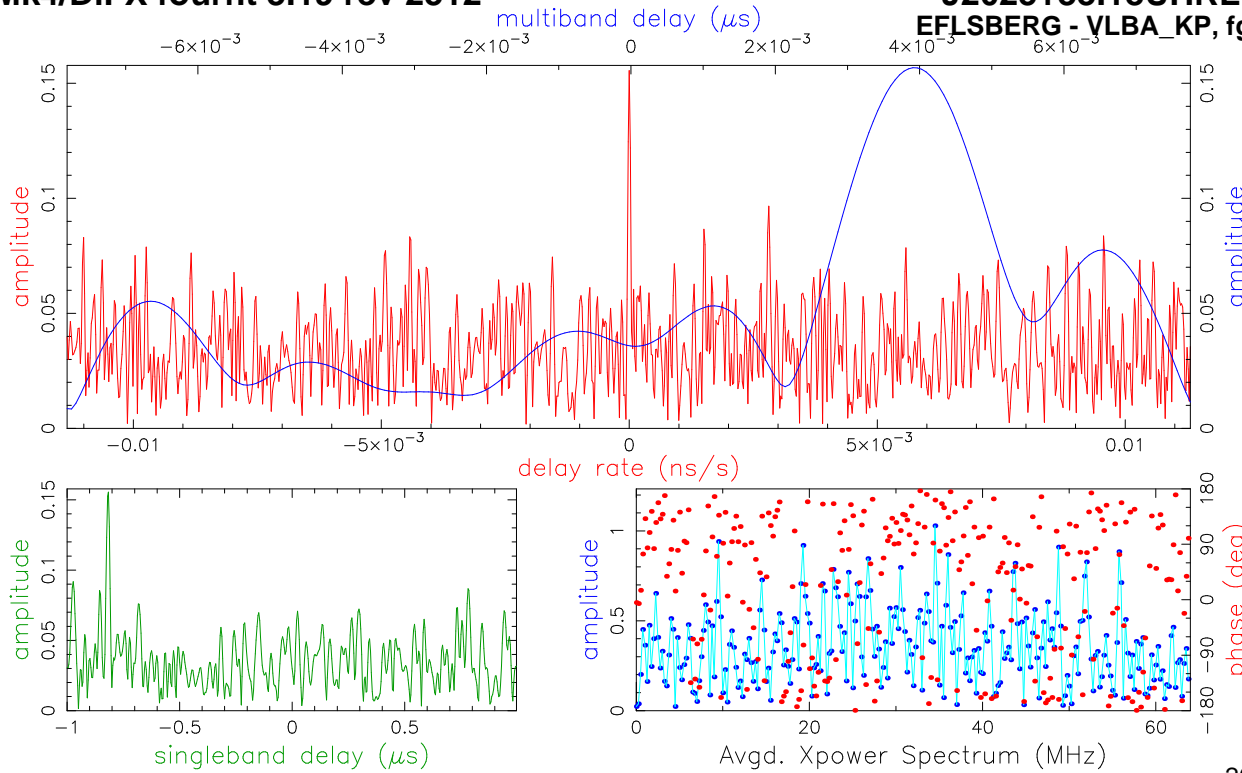
Fringe quality 0  
SNR 5.8  
Int time 173.832  
Amp 0.184  
Phase -58.9  
PFD 6.3e-01  
Delays (us)  
SBD 0.016344  
MBD 0.002774  
Fringe rate (Hz)  
-0.558604  
Ion TEC 0.000  
Ref freq (MHz)  
86140.0000  
AP (sec) 0.512  
Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143638  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-43.9	-62.7	-48.0	-82.2	-42.6	-63.8	-117.2	-32.4	Phase	-58.9
	0.2	0.1	0.2	0.3	0.2	0.3	0.2	0.2	Ampl.	0.2
	352.0	327.2	53.1	311.2	358.6	259.8	454.2	325.9	Sbd box	261.2
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
b	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
b:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
b:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
b	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
b	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Tracks	
Group delay (usec)(sbd)	-2.46217790891E+02		Apriori delay (usec)		-2.46236189531E+02		Resid mbdelay (usec)		2.77364E-03	+/- 1.9E-04
Sband delay (usec)	-2.46219845281E+02		Apriori clock (usec)		-1.0636593E+00		Resid sbdelay (usec)		1.63442E-02	+/- 1.5E-03
Phase delay (usec)	-2.46236191430E+02		Apriori clockrate (us/s)		-4.7400004E-08		Resid phdelay (usec)		-1.89888E-06	+/- 6.4E-07
Delay rate (us/s)	-1.78421005985E-01		Apriori rate (us/s)		-1.78414521145E-01		Resid rate (us/s)		-6.48484E-06	+/- 6.2E-09
Total phase (deg)			Apriori accel (us/s/s)		1.48088643584E-05		Resid phase (deg)		-58.9	+/- 19.9

ph/seg (deg) 44.3 46.6 Search (1024X32) 0.158 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 55.4 81.3 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 29.7 28.1 Inc. seg. avg. 0.179 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 37.8 49.0 Inc. frq. avg. 0.176 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 b: az 74.4 el 33.0 pa -50.7 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 1242.704 2356.674 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/bk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/bk.W.32.18UHRL

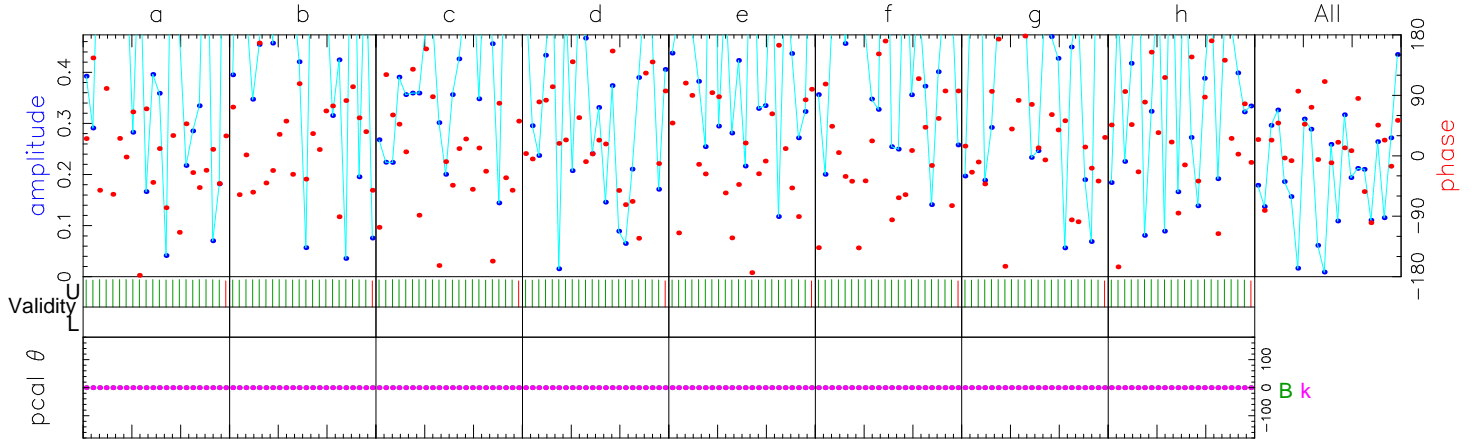


Fringe quality 0

SNR 5.8  
Int time 178.440  
Amp 0.158  
Phase 22.5  
PFD 6.4e-01  
Delays (us)  
SBD -0.817956  
MBD 0.003796  
Fringe rate (Hz)  
-0.000110  
Ion TEC 0.000  
Ref freq (MHz)  
86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143641  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

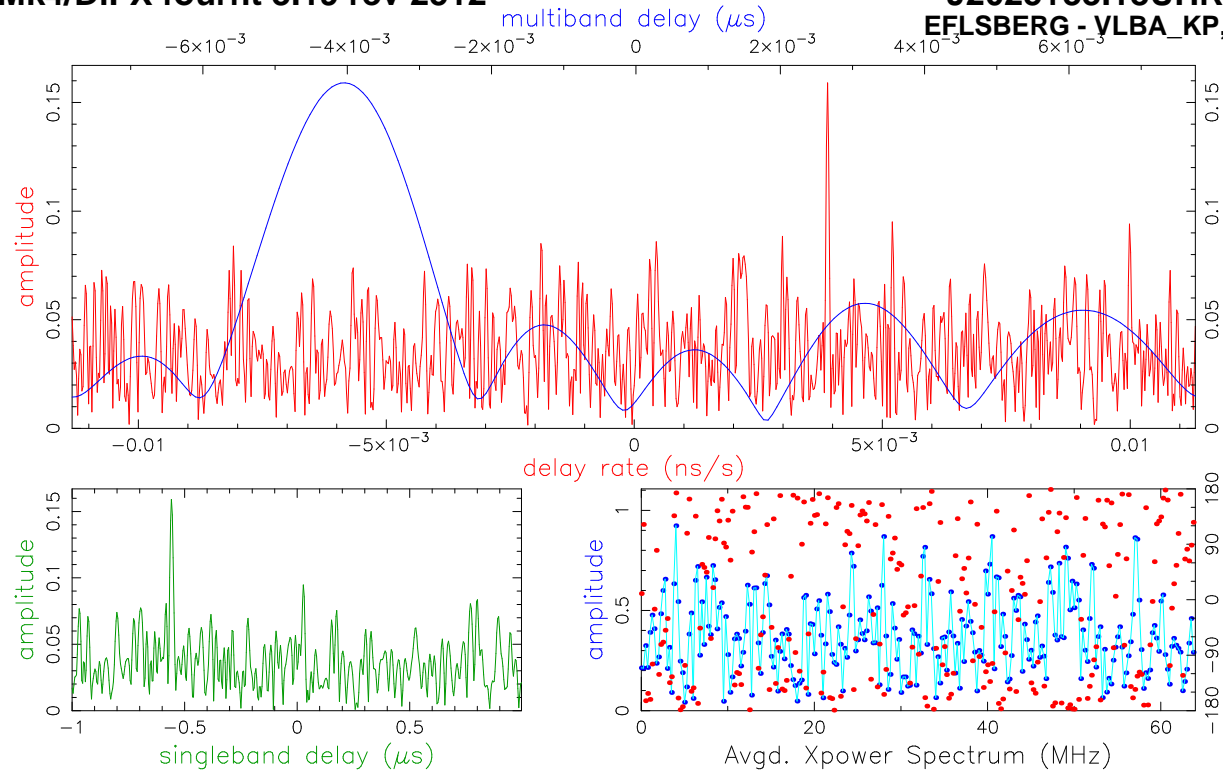


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	4.5	22.8	-0.5	60.1	51.3	-11.4	15.7	42.0	Phase	22.5
	0.3	0.3	0.2	0.2	0.1	0.1	0.2	0.1	Ampl.	0.1
	218.5	46.8	173.4	368.0	436.4	174.5	81.6	265.3	Sbd box	47.6
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
B	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
B:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
B:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Manl PC	
B	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000		
B	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	
									Tracks	
Group delay (usec)(sbd)	4.37643882054E+03		Apriori delay (usec)		4.37726314976E+03		Resid mbdelay (usec)		3.79578E-03	+/- 1.9E-04
Sband delay (usec)	4.37644519401E+03		Apriori clock (usec)		1.3394143E+01		Resid sbdelay (usec)		-8.17956E-01	+/- 1.5E-03
Phase delay (usec)	4.37726315048E+03		Apriori clockrate (us/s)		-2.0540000E-07		Resid phdelay (usec)		7.25817E-07	+/- 6.4E-07
Delay rate (us/s)	-1.64972385404E+00		Apriori rate (us/s)		-1.64972385276E+00		Resid rate (us/s)		-1.27966E-09	+/- 6.2E-09
Total phase (deg)	281.8		Apriori accel (us/s/s)		-7.98758270781E-06		Resid phase (deg)		22.5	+/- 19.9

	RMS	Theor.	Amplitude	0.158 +/- 0.027	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
ph/seg (deg)	51.8	46.6	Search (1024X32)	0.157	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.008	0.008
amp/seg (%)	72.5	81.4	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
ph/frq (deg)	27.9	28.1	Inc. seg. avg.	0.152	Sample rate(MISamp/s): 128		ion window (TEC)	0.00	0.00
amp/frq (%)	37.9	49.1	Inc. frq. avg.	0.149	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite			

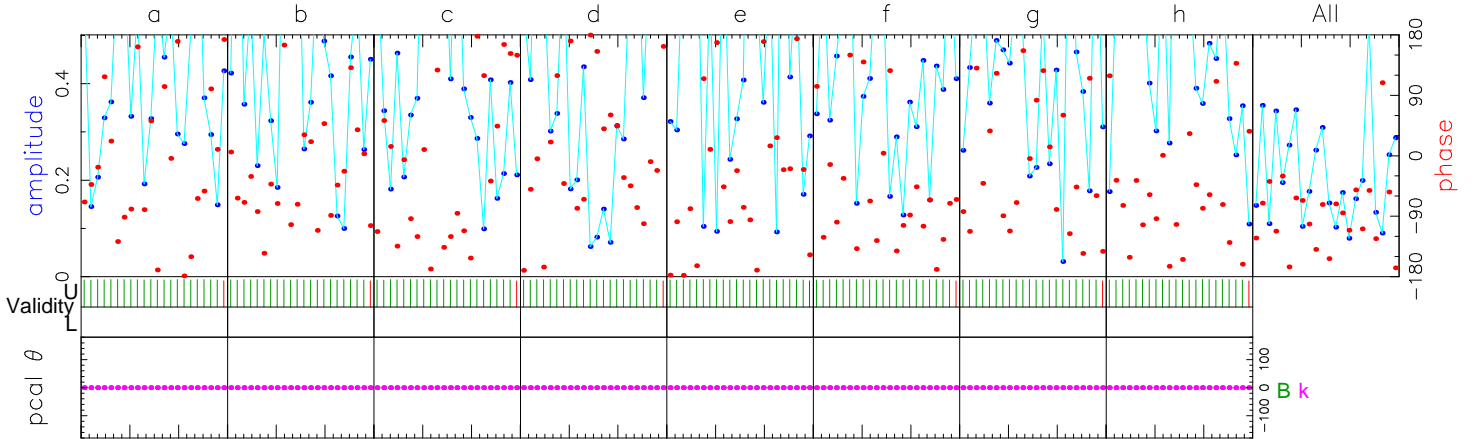
B: az 264.9 el 50.1 pa 49.5 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 11363.314 1304.178 simultaneous interpolator

Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/Bk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/Bk.W.45.18UHRL



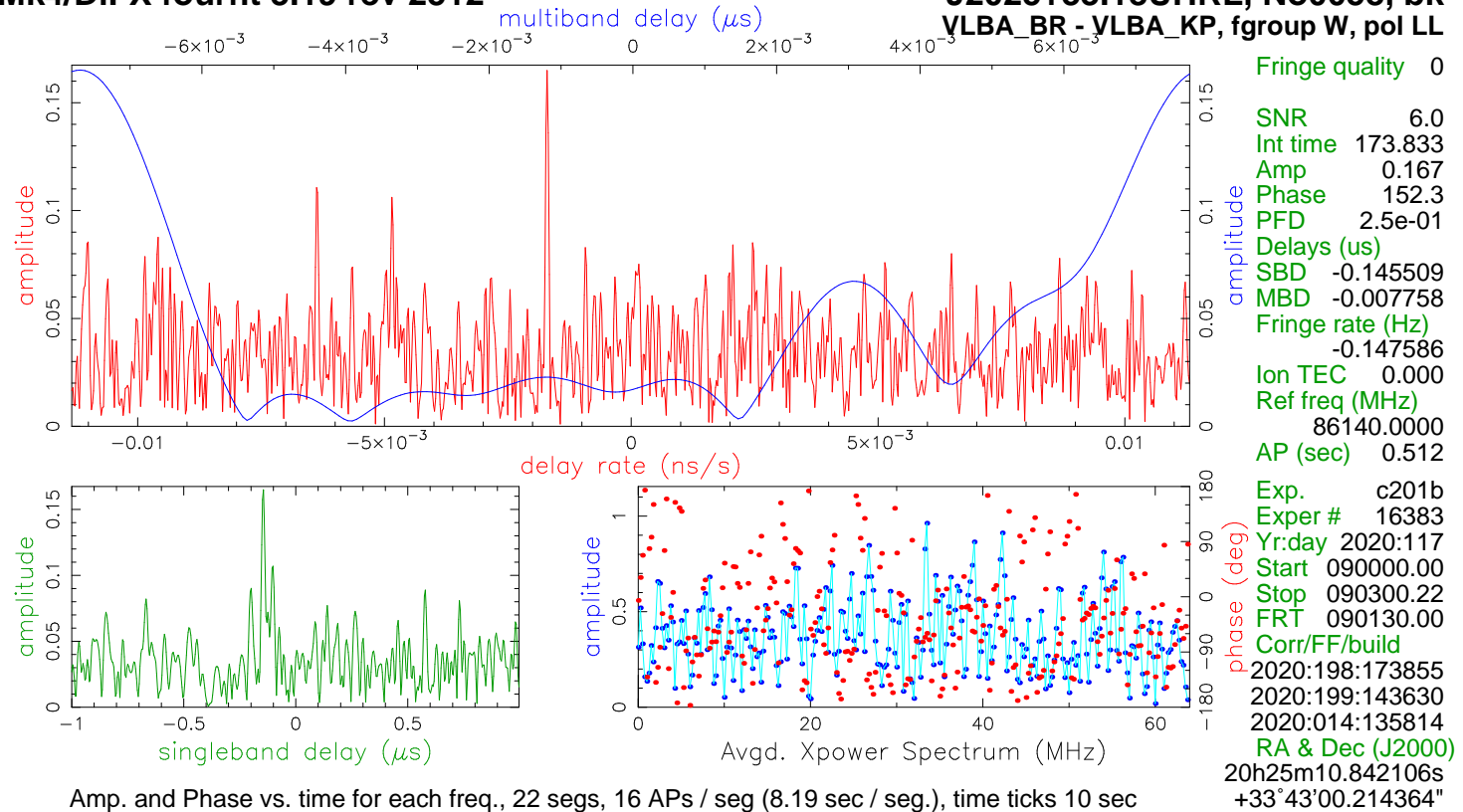
Fringe quality 0  
 SNR 5.8  
 Int time 178.440  
 Amp 0.167  
 Phase -90.0  
 PFD 5.4e-01  
 Delays (us)  
 SBD -0.558370  
 MBD -0.004037  
 Fringe rate (Hz) 0.335472  
 Ion TEC 0.000  
 Ref freq (MHz) 86140.0000  
 AP (sec) 0.512  
 Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090000.00  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143645  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

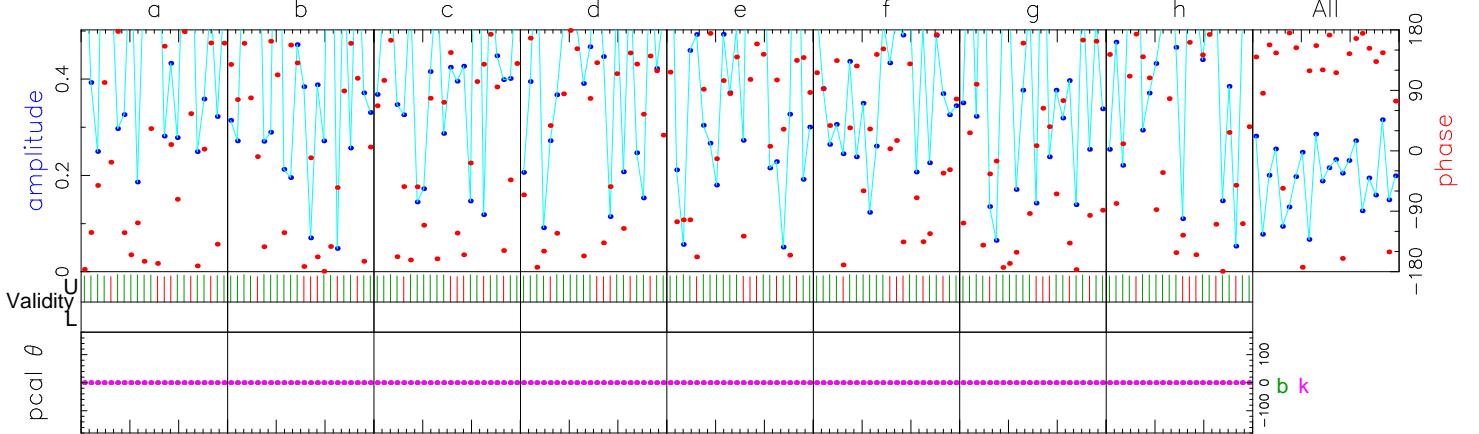


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-109.8	-65.8	-128.7	-56.1	-89.7	-100.4	-98.8	-84.8	Phase	-90.0
	0.1	0.2	0.2	0.1	0.2	0.2	0.1	0.3	Ampl.	0.2
	72.6	23.5	57.9	197.8	461.0	489.1	302.5	113.4	Sbd box	114.1
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
B	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
B:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
B:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
B	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000		
B	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	
									Tracks	
Group delay (usec)(sbd)	4.37671223812E+03		Apriori delay (usec)		4.37726314976E+03		Resid mbdelay (usec)		-4.03664E-03	+/- 1.9E-04
Sband delay (usec)	4.37670477926E+03		Apriori clock (usec)		1.3394143E+01		Resid sbdelay (usec)		-5.58370E-01	+/- 1.5E-03
Phase delay (usec)	4.37726314686E+03		Apriori clockrate (us/s)		-2.0540000E-07		Resid phdelay (usec)		-2.90337E-06	+/- 6.4E-07
Delay rate (us/s)	-1.64971995826E+00		Apriori rate (us/s)		-1.64972385276E+00		Resid rate (us/s)		3.89449E-06	+/- 6.1E-09
Total phase (deg)	169.2		Apriori accel (us/s/s)		-7.98758270781E-06		Resid phase (deg)		-90.0	+/- 19.7

ph/seg (deg) 52.4 46.2 Search (1024X32) 0.157 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 78.3 80.7 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 25.3 27.9 Inc. seg. avg. 0.172 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 26.7 48.7 Inc. frq. avg. 0.160 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 B: az 264.9 el 50.1 pa 49.5 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 11363.314 1304.178 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/Bk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/Bk.W.62.18UHRL

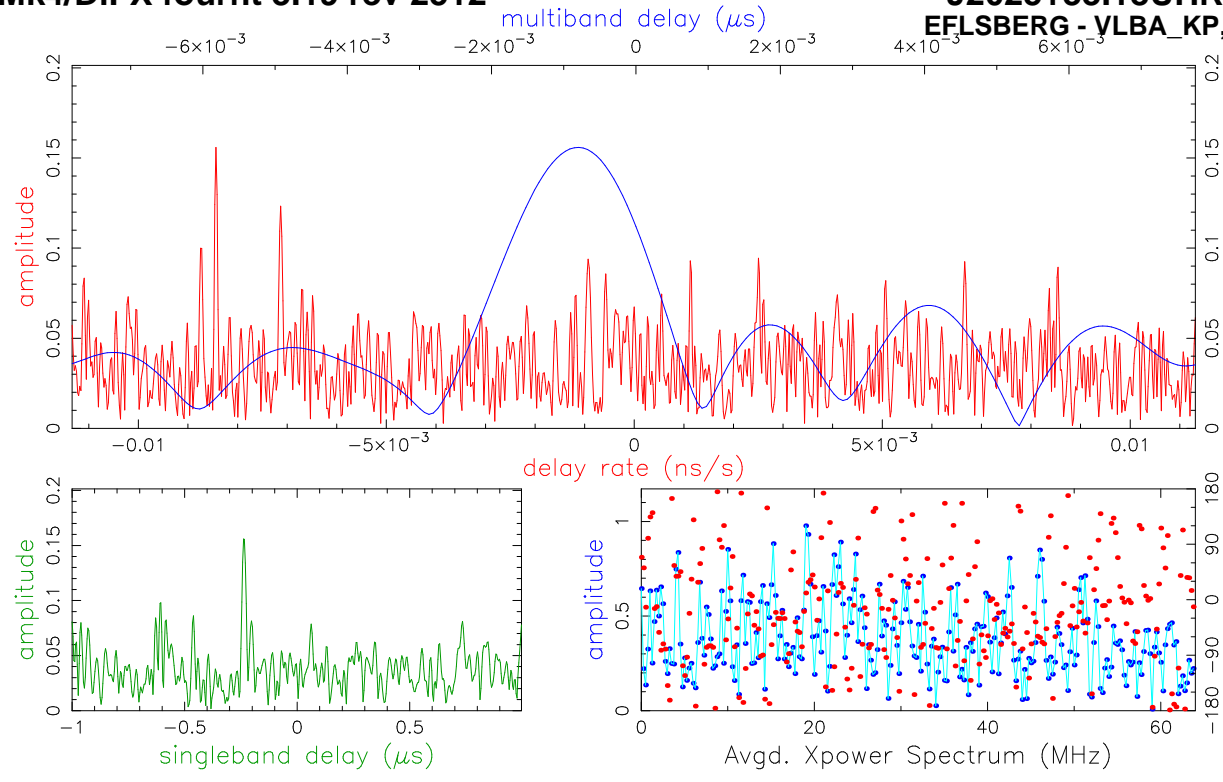


Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
b	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
b:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
b:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
b	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000		
b	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-2.46384572823E+02		Apriori delay (usec)	-2.46236189531E+02	Resid mbdelay (usec)	-7.75829E-03	+/-	1.8E-04		
Sband delay (usec)	-2.46381698531E+02		Apriori clock (usec)	-1.0636593E+00	Resid sbdelay (usec)	-1.45509E-01	+/-	1.4E-03		
Phase delay (usec)	-2.46236184620E+02		Apriori clockrate (us/s)	-4.7400004E-08	Resid phdelay (usec)	4.91101E-06	+/-	6.2E-07		
Delay rate (us/s)	-1.78416234476E-01		Apriori rate (us/s)	-1.78414521145E-01	Resid rate (us/s)	-1.71333E-06	+/-	5.9E-09		
Total phase (deg)		20.5	Apriori accel (us/s/s)	1.48088643584E-05	Resid phase (deg)	152.3	+/-	19.2		

ph/seg (deg) 45.3 44.9 Search (1024X32) 0.157 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 44.2 78.4 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 28.3 27.1 Inc. seg. avg. 0.152 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 39.0 47.3 Inc. frq. avg. 0.160 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 b: az 74.4 el 33.0 pa -50.7 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 1242.704 2356.674 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/bk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/bk.W.7.18UHRL

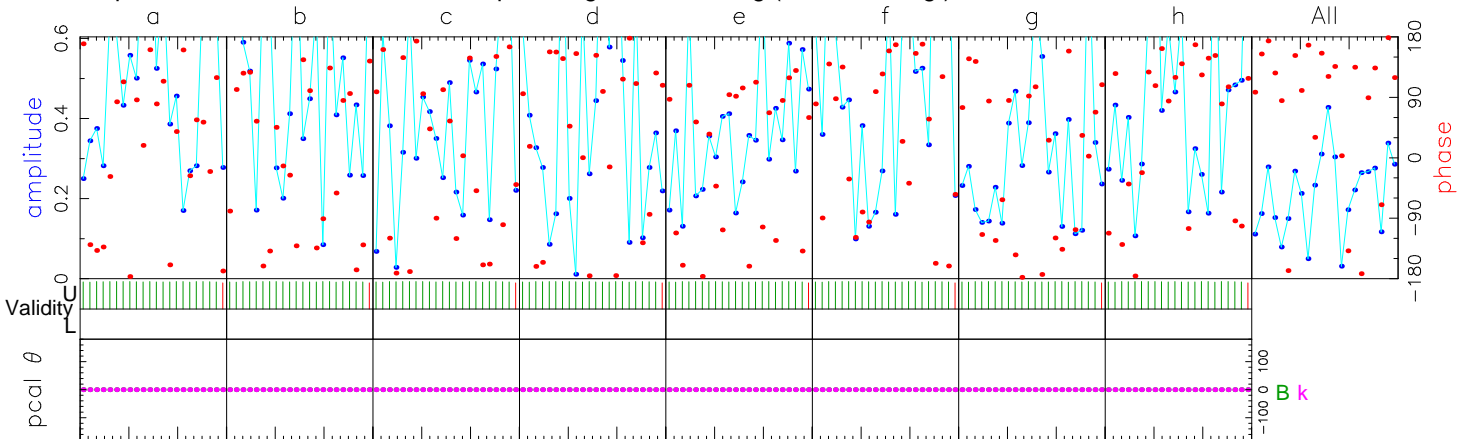


Fringe quality 0

SNR 5.8  
Int time 178.440  
Amp 0.201  
Phase 140.7  
PFD 5.8e-01  
Delays (us)  
SBD -0.236382  
MBD -0.000783  
Fringe rate (Hz)  
-0.727111  
Ion TEC 0.000  
Ref freq (MHz)  
86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143648  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

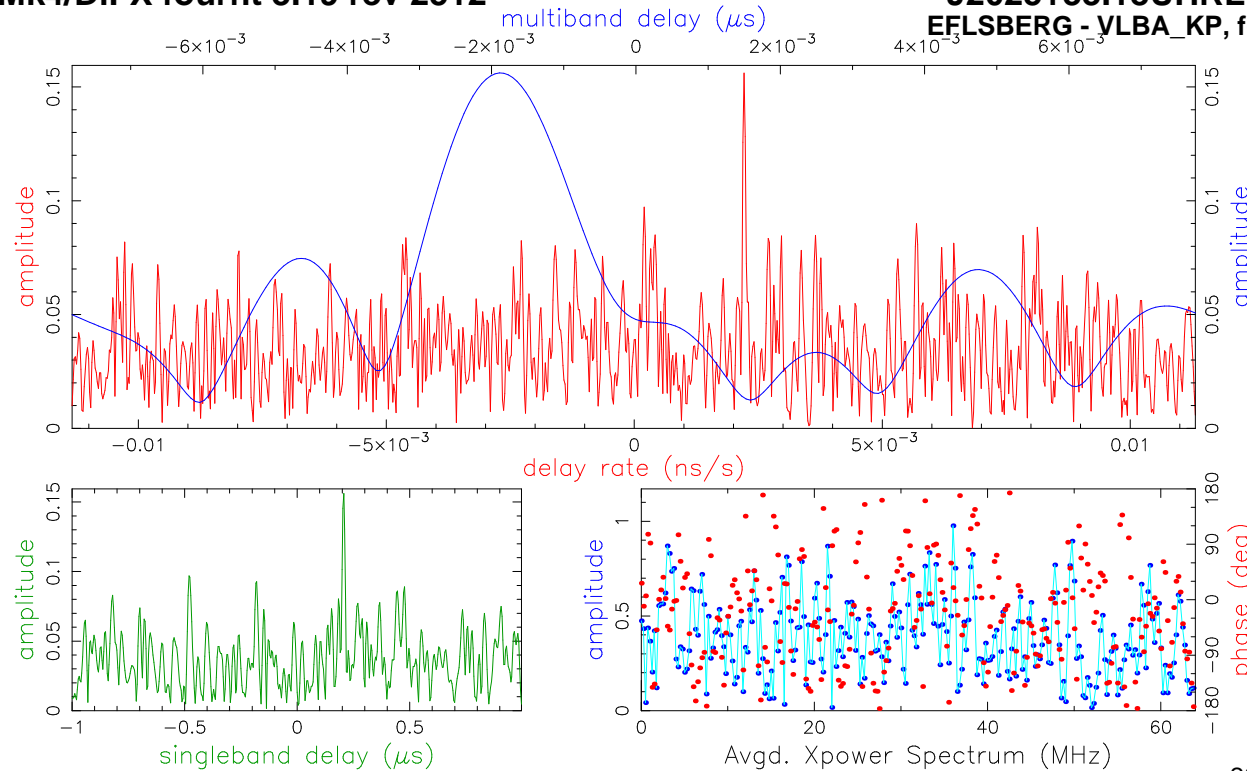


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	99.6	166.5	178.0	126.5	138.0	152.0	126.2	134.9	Phase	140.7
	0.2	0.2	0.2	0.3	0.1	0.2	0.1	0.3	Ampl.	0.2
	16.0	471.5	89.5	439.0	126.0	63.7	181.1	196.2	Sbd box	196.5
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
B	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
B:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
B:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
B	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
B	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Tracks	
Group delay (usec)(sbd)	4.37702799147E+03		Apriori delay (usec)		4.37726314976E+03		Resid mbdelay (usec)		-7.83292E-04	+/- 1.9E-04
Sband delay (usec)	4.37702676776E+03		Apriori clock (usec)		1.3394143E+01		Resid sbdelay (usec)		-2.36382E-01	+/- 1.5E-03
Phase delay (usec)	4.37726315430E+03		Apriori clockrate (us/s)		-2.0540000E-07		Resid phdelay (usec)		4.53847E-06	+/- 6.4E-07
Delay rate (us/s)	-1.64973229379E+00		Apriori rate (us/s)		-1.64972385276E+00		Resid rate (us/s)		-8.44104E-06	+/- 6.1E-09
Total phase (deg)	40.0		Apriori accel (us/s/s)		-7.98758270781E-06		Resid phase (deg)		140.7	+/- 19.8

ph/seg (deg) 60.0 46.4 Amplitude 0.201 +/- 0.035 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 71.2 81.0 Search (1024X32) 0.154 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 26.8 28.0 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 33.4 48.8 Inc. seg. avg. 0.205 Sample rate(MISamp/s): 128 dr window (ns/s) -0.011 0.011  
 Inc. frq. avg. 0.192 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite ion window (TEC) 0.00 0.00

B: az 264.9 el 50.1 pa 49.5 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 11363.314 1304.178 simultaneous interpolator

Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/Bk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/Bk.W.78.18UHRL

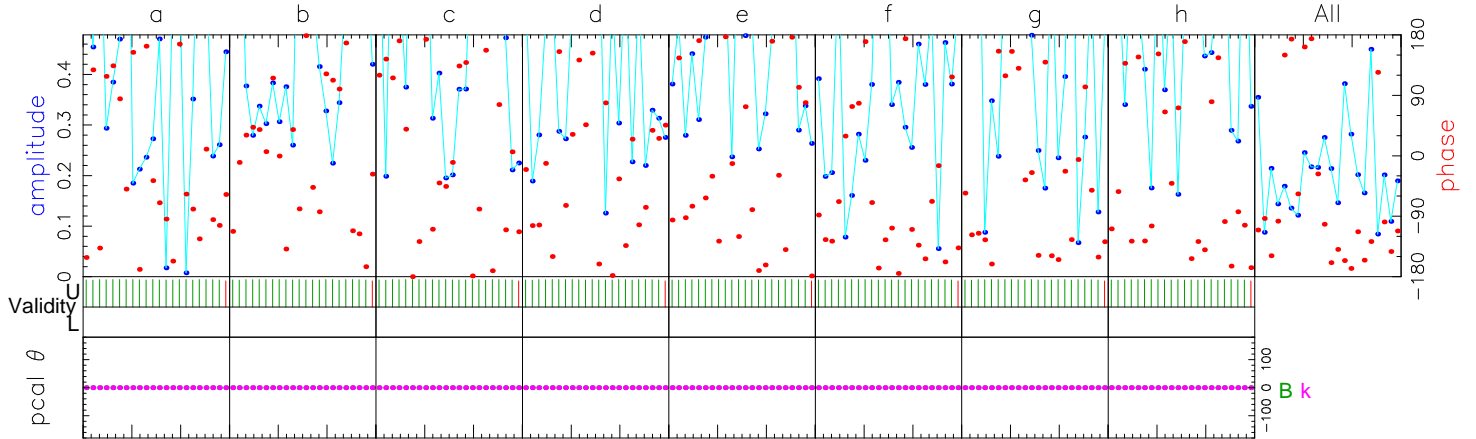


Fringe quality 0

SNR 5.7  
Int time 178.440  
Amp 0.159  
Phase -137.8  
PFD 7.0e-01  
Delays (us)  
SBD 0.206185  
MBD -0.001908  
Fringe rate (Hz)  
0.190228  
Ion TEC 0.000  
Ref freq (MHz)  
86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143630  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

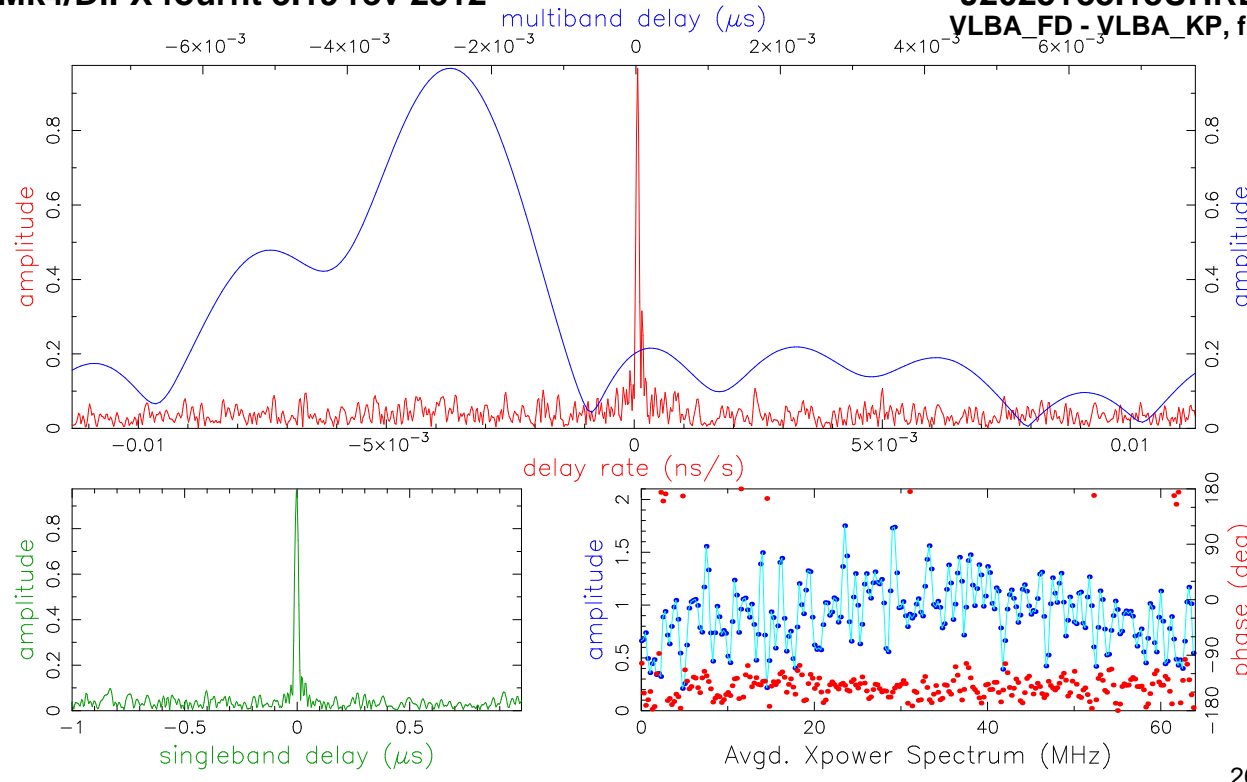
Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-128.2	-88.0	173.6	-130.1	-137.5	-132.4	-119.1	-142.3	Phase	-137.8
	0.2	0.1	0.2	0.0	0.2	0.2	0.2	0.3	Ampl.	0.2
	378.0	151.3	271.0	455.1	440.6	133.1	154.2	434.2	Sbd box	309.8
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
B	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
B:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
B:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Manl PC	
B	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
B	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Tracks	
Group delay (usec)(sbd)	4.37746436669E+03		Apriori delay (usec)		4.37726314976E+03		Resid mbdelay (usec)		-1.90807E-03	+/- 1.9E-04
Sband delay (usec)	4.37746933451E+03		Apriori clock (usec)		1.3394143E+01		Resid sbdelay (usec)		2.06185E-01	+/- 1.5E-03
Phase delay (usec)	4.37726314532E+03		Apriori clockrate (us/s)		-2.0540000E-07		Resid phdelay (usec)		-4.44364E-06	+/- 6.4E-07
Delay rate (us/s)	-1.64972164440E+00		Apriori rate (us/s)		-1.64972385276E+00		Resid rate (us/s)		2.20836E-06	+/- 6.2E-09
Total phase (deg)			Apriori accel (us/s/s)		-7.98758270781E-06		Resid phase (deg)		-137.8	+/- 20.0

ph/seg (deg) 49.0 46.9 Search (1024X32) 0.152 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 67.5 81.8 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 30.0 28.3 Inc. seg. avg. 0.160 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 44.6 49.3 Inc. frq. avg. 0.155 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 B: az 264.9 el 50.1 pa 49.5 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 11363.314 1304.178 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/Bk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/Bk.W.8.18UHRL



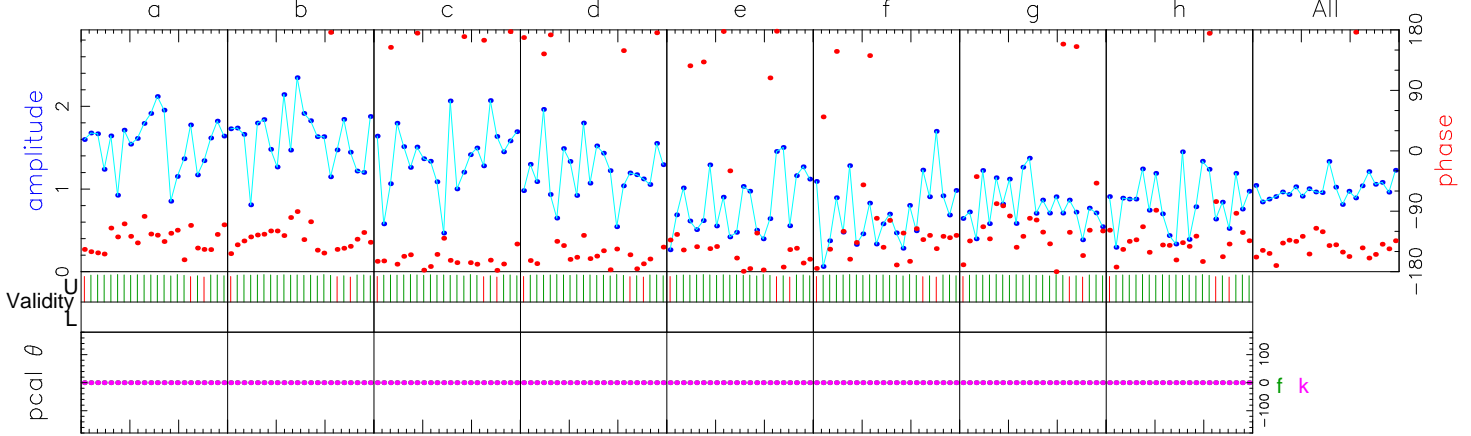


Fringe quality 7

SNR 35.3  
Int time 174.784  
Amp 0.975  
Phase -145.1  
PFD 0.0e+00  
Delays (us)  
SBD -0.002731  
MBD -0.002564  
Fringe rate (Hz) 0.005785  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512

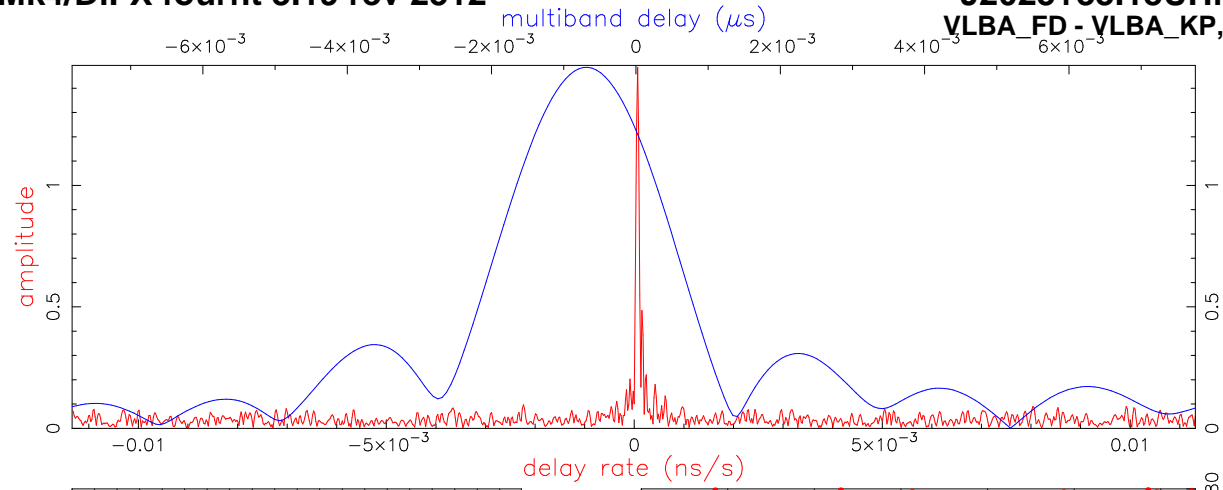
Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143642  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-130.5	-130.6	-169.2	-165.5	-165.7	-144.7	-120.7	-133.8	Phase	-145.1
	1.5	1.5	1.3	1.1	0.7	0.6	0.6	0.8	Ampl.	1.0
	256.5	256.1	256.2	256.1	256.5	256.5	256.4	256.6	Sbd box	256.3
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
f	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
f:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
f:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Manl PC	
f	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
f	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Tracks	
Group delay (usec)(sbd)	1.68284619032E+03		Apriori delay (usec)		1.68284875386E+03		Resid mbdelay (usec)		-2.56354E-03	+/- 3.1E-05
Sband delay (usec)	1.68284602236E+03		Apriori clock (usec)		4.2445550E+00		Resid sbdelay (usec)		-2.73150E-03	+/- 2.4E-04
Phase delay (usec)	1.68284874918E+03		Apriori clockrate (us/s)		1.0360000E-07		Resid phdelay (usec)		-4.67905E-06	+/- 1.0E-07
Delay rate (us/s)	-5.07335493325E-02		Apriori rate (us/s)		-5.07336164910E-02		Resid rate (us/s)		6.71585E-08	+/- 1.0E-09
Total phase (deg)			Apriori accel (us/s/s)		-1.01621670997E-05		Resid phase (deg)		-145.1	+/- 3.3

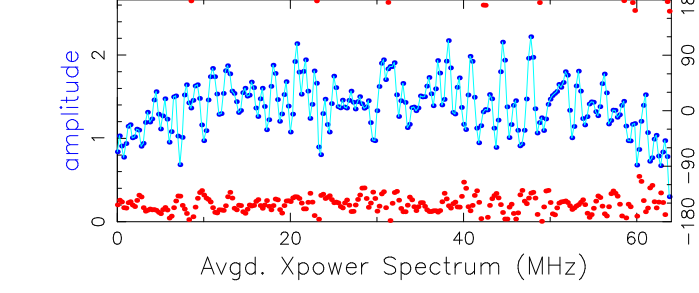
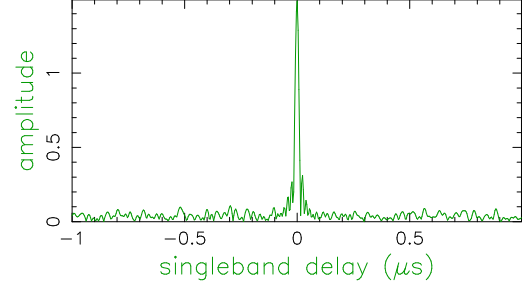
ph/seg (deg) 15.5 7.6 Search (1024X32) 0.975 +/- 0.028 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
amp/seg (%) 12.9 13.3 Interp. 0.959 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
ph/frq (deg) 20.7 4.6 Inc. seg. avg. 0.993 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
amp/frq (%) 37.9 8.0 Inc. frq. avg. 1.014 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
f: az 69.5 el 39.4 pa -75.8 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 342.009 -680.904 simultaneous interpolator  
Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/fk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/fk.W.49.18UHRL



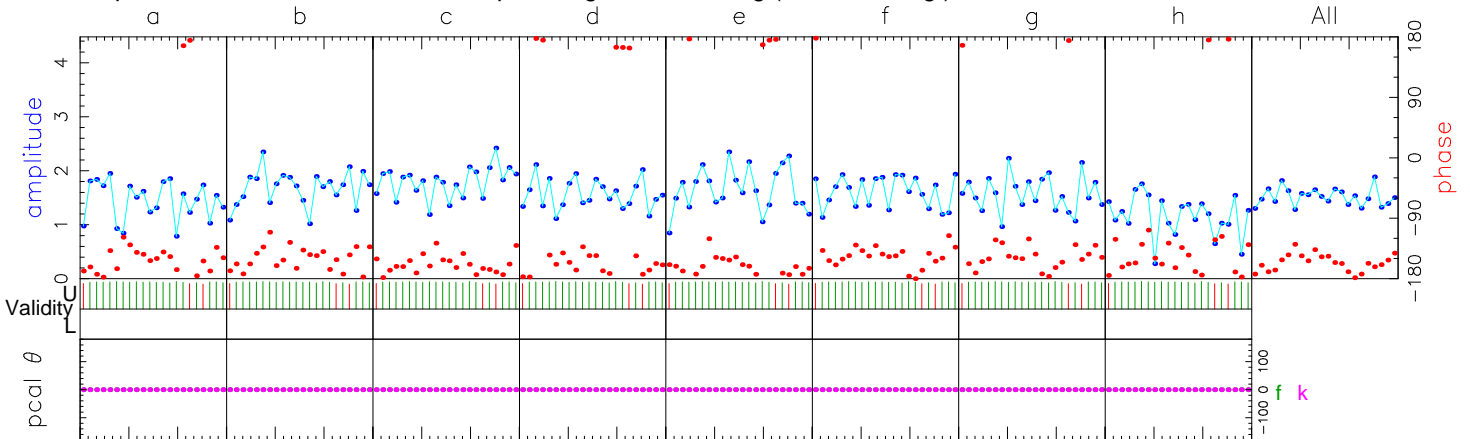
Fringe quality 8

SNR 54.0  
Int time 174.783  
Amp 1.494  
Phase -155.7  
PFD 0.0e+00  
Delays (us)  
SBD -0.000955  
MBD -0.000712  
Fringe rate (Hz) 0.005917  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143645  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"



Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

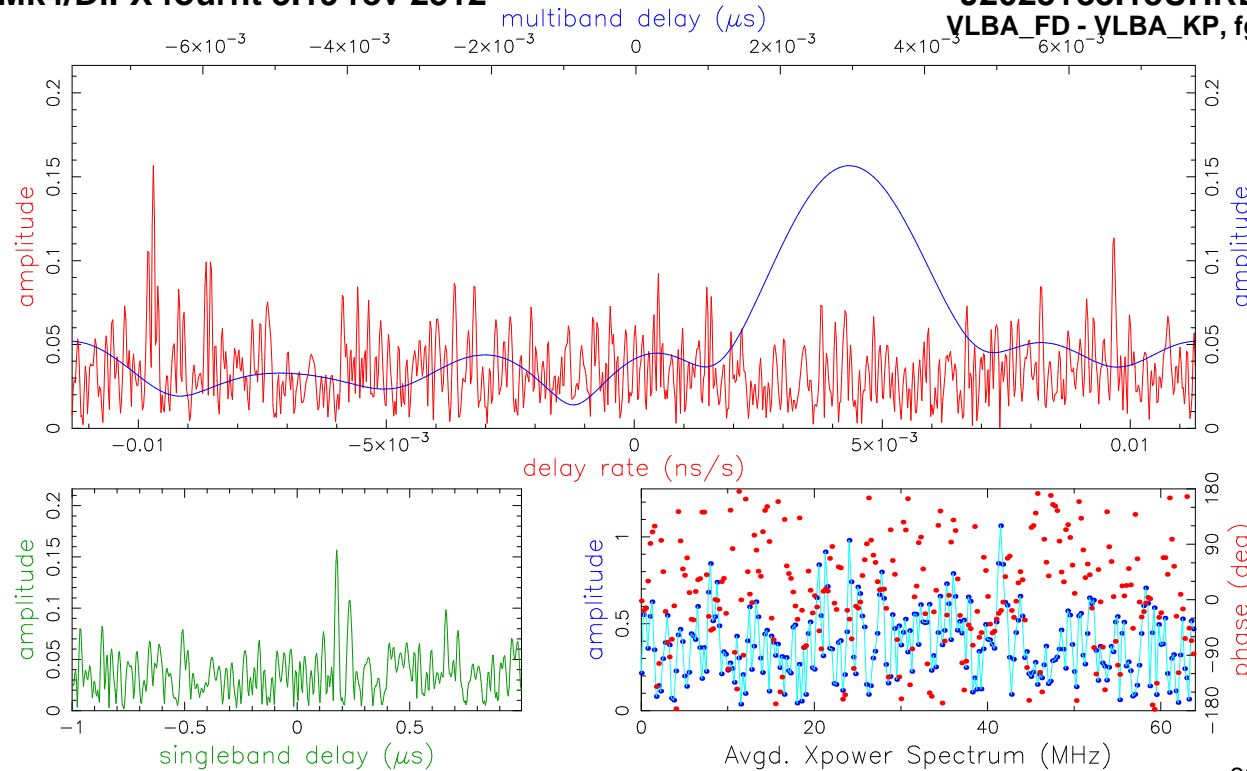


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
f	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
f:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
f:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
f	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	
Group delay (usec)(sbd)	1.68284804220E+03	1.68284779911E+03	1.68284874884E+03	1.68284875386E+03	1.68284875386E+03	1.68284875386E+03	1.68284875386E+03	1.68284875386E+03	Resid mbdelay (usec)	-7.11664E-04 +/- 2.0E-05
Sband delay (usec)	1.68284779911E+03	1.68284779911E+03	1.68284779911E+03	1.68284779911E+03	1.68284779911E+03	1.68284779911E+03	1.68284779911E+03	1.68284779911E+03	Resid sbdelay (usec)	-9.54750E-04 +/- 1.6E-04
Phase delay (usec)	1.68284874884E+03	1.68284874884E+03	1.68284874884E+03	1.68284874884E+03	1.68284874884E+03	1.68284874884E+03	1.68284874884E+03	1.68284874884E+03	Resid phdelay (usec)	-5.02129E-06 +/- 6.8E-08
Delay rate (us/s)	-5.07335477950E-02	-5.07335477950E-02	-5.07335477950E-02	-5.07335477950E-02	-5.07335477950E-02	-5.07335477950E-02	-5.07335477950E-02	-5.07335477950E-02	Resid rate (us/s)	6.86961E-08 +/- 6.6E-10
Total phase (deg)			81.1						Resid phase (deg)	-155.7 +/- 2.1

ph/seg (deg) 12.4 5.0  
amp/seg (%) 10.6 8.7  
ph/frq (deg) 7.1 3.0  
amp/frq (%) 12.5 5.2

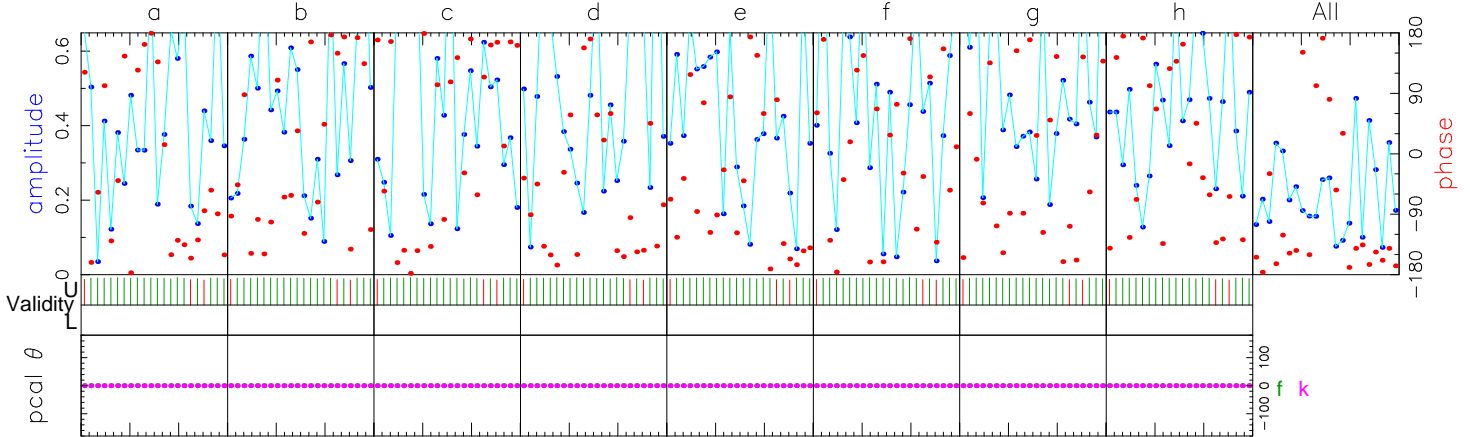
f: az 69.5 el 39.4 pa -75.8  
k: az 68.2 el 33.7 pa -71.5  
u,v (fr/asec) 342.009 -680.904

Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/fk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/fk.W.63.18UHRL



Fringe quality 0  
SNR 5.7  
Int time 174.784  
Amp 0.216  
Phase -158.0  
PFD 8.3e-01  
Delays (us)  
SBD 0.175416  
MBD 0.002951  
Fringe rate (Hz) -0.836615  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512  
Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143649  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

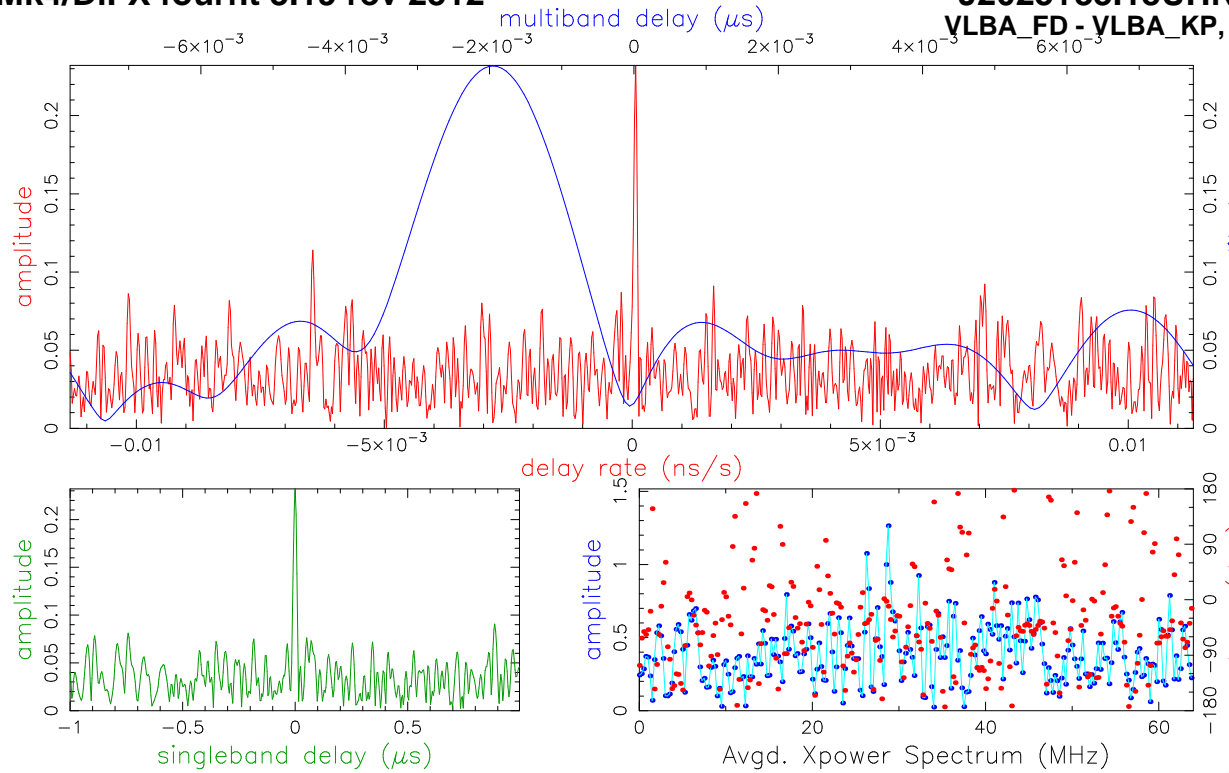


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
f	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
f:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
f:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
f	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000		
f	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	

Group delay (usec)(sbd)	1.68302357972E+03	Apriori delay (usec)		1.68284875386E+03	Resid mbdelay (usec)		2.95086E-03	+/- 1.9E-04	
Sband delay (usec)	1.68302416961E+03	Apriori clock (usec)		4.2445550E+00	Resid sbdelay (usec)		1.75416E-01	+/- 1.5E-03	
Phase delay (usec)	1.68284874877E+03	Apriori clockrate (us/s)		1.0360000E-07	Resid phdelay (usec)		-5.09503E-06	+/- 6.5E-07	
Delay rate (us/s)	-5.07433287569E-02	Apriori rate (us/s)		-5.07336164910E-02	Resid rate (us/s)		-9.71227E-06	+/- 6.3E-09	
Total phase (deg)	78.8		Apriori accel (us/s/s)		-1.01621670997E-05	Resid phase (deg)		-158.0	+/- 20.2

ph/seg (deg)	63.4	Theor. 47.4	Amplitude Search (1024X32)	0.216 +/- 0.038	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
amp/seg (%)	79.7	82.8	Interp.	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	SampCntNorm: enabled	mb window (us)	-0.008	0.008
ph/frq (deg)	36.2	28.6	Inc. seg. avg.	0.224	Bits/sample: 2x2	Sample rate(MISamp/s): 128	dr window (ns/s)	-0.011	0.011
amp/frq (%)	43.8	49.9	Inc. frq. avg.	0.205	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite	ion window (TEC)	0.00	0.00

f: az 69.5 el 39.4 pa -75.8 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 342.009 -680.904 simultaneous interpolator  
Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/fk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/fk.W.81.18UHRL

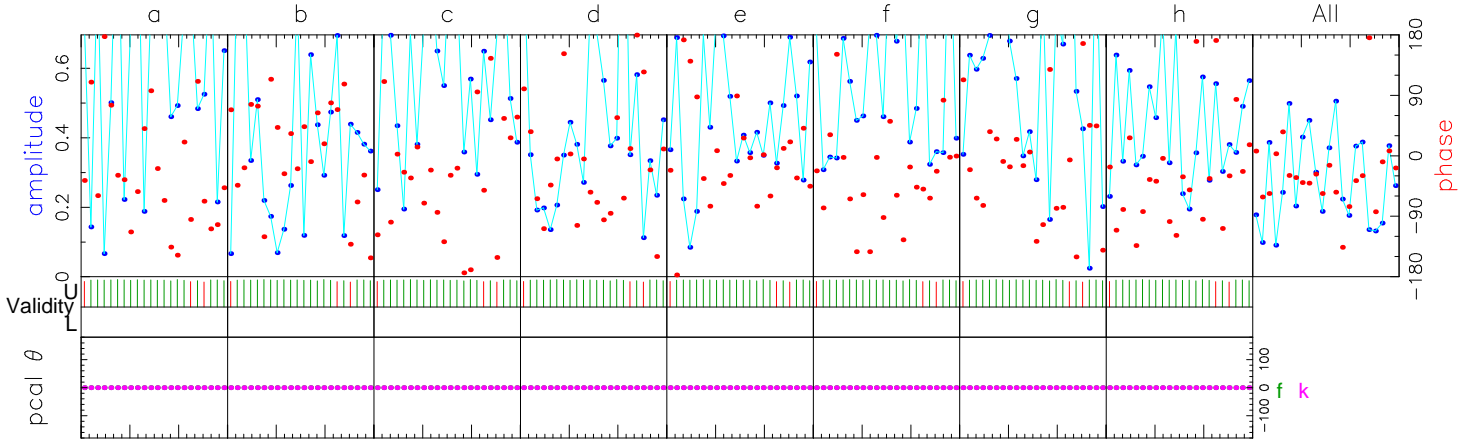


Fringe quality 9

SNR 8.4  
Int time 174.783  
Amp 0.232  
Phase -34.3  
PFD 8.6e-09  
Delays (us)  
SBD -0.000530  
MBD -0.001959  
Fringe rate (Hz) 0.005885  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143651  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



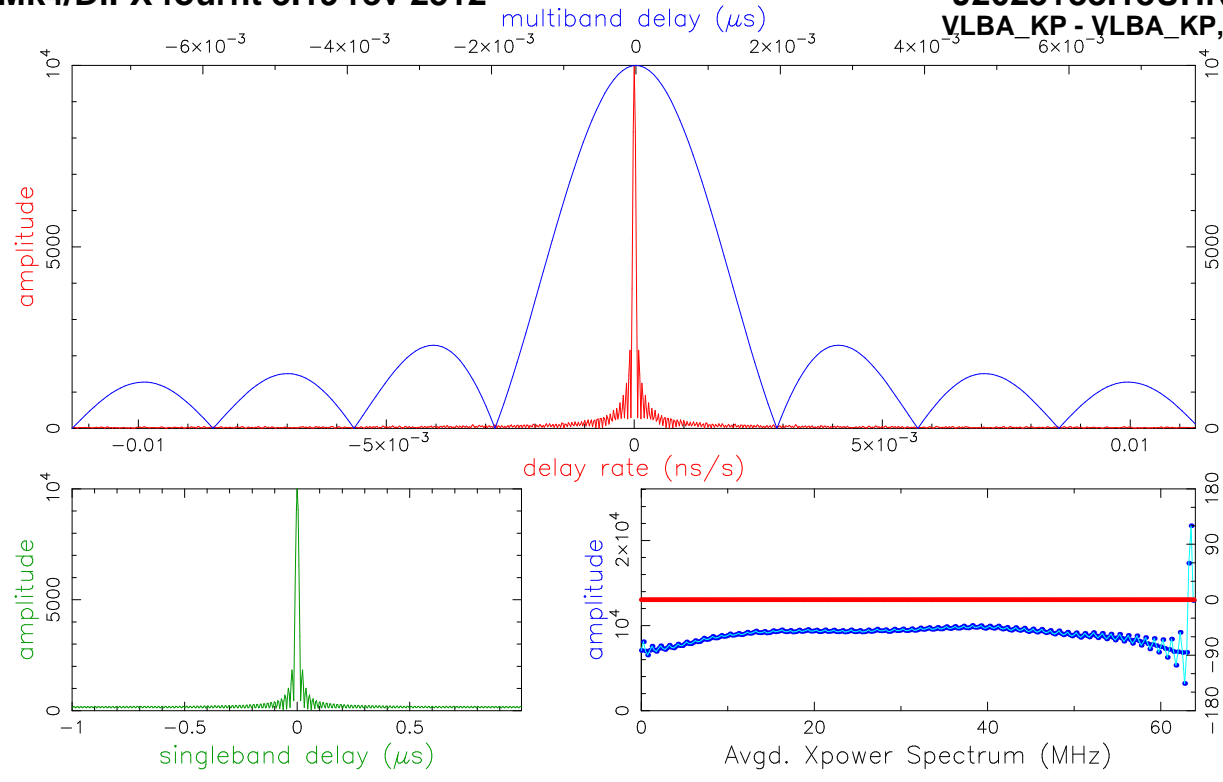
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-56.5	4.8	-36.2	-46.8	-19.0	-38.0	-20.8	-58.0	Phase	-34.3
	0.3	0.2	0.2	0.2	0.3	0.3	0.2	0.2	Ampl.	0.2
	256.5	158.4	491.0	281.0	256.5	257.0	256.2	361.0	Sbd box	256.9
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
f	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
f:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
f:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
f	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
f	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	

Group delay (usec)(sbd)	1.68284679479E+03	Apriori delay (usec)	1.68284875386E+03	Resid mbdelay (usec)	-1.95907E-03	+/-	1.3E-04
Sband delay (usec)	1.68284822386E+03	Apriori clock (usec)	4.2445550E+00	Resid sbdelay (usec)	-5.30000E-04	+/-	1.0E-03
Phase delay (usec)	1.68284875276E+03	Apriori clockrate (us/s)	1.0360000E-07	Resid phdelay (usec)	-1.10601E-06	+/-	4.4E-07
Delay rate (us/s)	-5.07335481705E-02	Apriori rate (us/s)	-5.07336164910E-02	Resid rate (us/s)	6.83205E-08	+/-	4.2E-09
Total phase (deg)	202.5	Apriori accel (us/s/s)	-1.01621670997E-05	Resid phase (deg)	-34.3	+/-	13.7

ph/seg (deg)	47.5	Theor.	32.0	Amplitude	0.232 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
amp/seg (%)	59.0		55.9	Search (1024X32)	0.231	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.008	0.008
ph/frq (deg)	23.0		19.3	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
amp/frq (%)	25.3		33.7	Inc. seg. avg.	0.242	Sample rate(MISamp/s): 128		ion window (TEC)	0.00	0.00
				Inc. frq. avg.	0.232	Data rate(Mb/s): 2048	nlags: 256	t_cohere infinite		

f: az 69.5 el 39.4 pa -75.8 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 342.009 -680.904 simultaneous interpolator

Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/fk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/fk.W.88.18UHRL

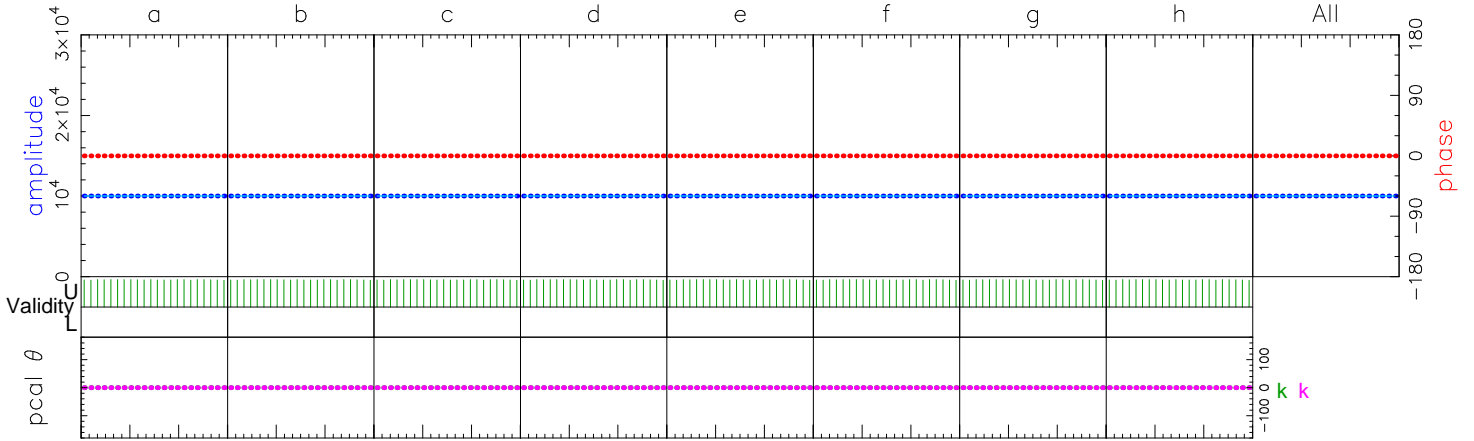


Fringe quality 9

SNR 365503.9  
Int time 178.644  
Amp 10000.001  
Phase 0.0  
PFD 0.0e+00  
Delays (us)  
SBD 0.000000  
MBD 0.000000  
Fringe rate (Hz)  
0.000000  
Ion TEC 0.000  
Ref freq (MHz)  
86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143658  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

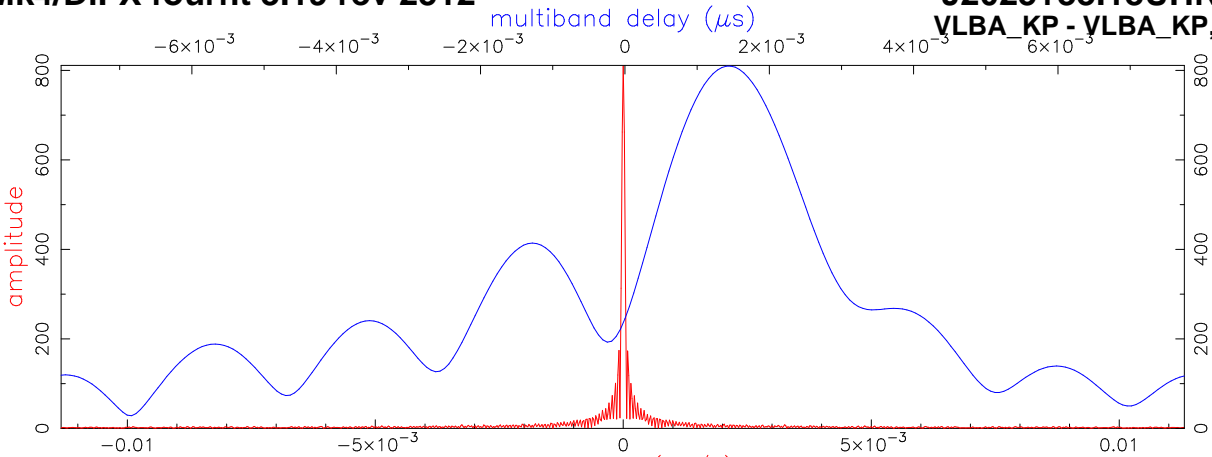


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	257.0	257.0
k	1000	1000	1000	1000	1000	1000	1000	1000	10000.0	10000.0
k:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0
k:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0
k	1000	1000	1000	1000	1000	1000	1000	1000	10000.0	10000.0
k	1000	1000	1000	1000	1000	1000	1000	1000	10000.0	10000.0
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		

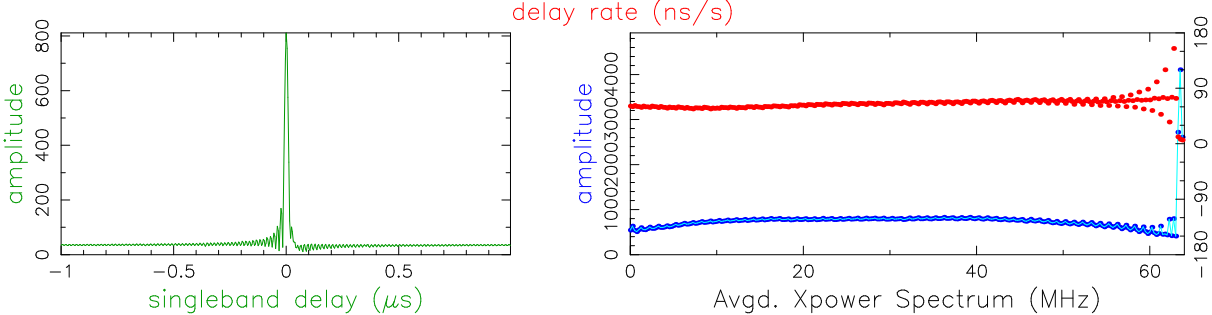
Group delay (usec)(sbd) 0.0000000000E+00 Apriori delay (usec) 0.0000000000E+00 Resid mbdelay (usec) 0.00000E+00 +/- 3.0E-09  
 Sband delay (usec) 0.0000000000E+00 Apriori clock (usec) 0.0000000E+00 Resid sbdelay (usec) 0.00000E+00 +/- 2.4E-08  
 Phase delay (usec) 6.73229045407E-20 Apriori clockrate (us/s) 0.0000000E+00 Resid phdelay (usec) 6.73229E-20 +/- 1.0E-11  
 Delay rate (us/s) 0.0000000000E+00 Apriori rate (us/s) 0.0000000000E+00 Resid rate (us/s) 0.00000E+00 +/- 9.7E-14  
 Total phase (deg) 0.0 Apriori accel (us/s/s) 0.0000000000E+00 Resid phase (deg) 0.0 +/- 0.0

RMS Theor. Amplitude 10000.001 +/- 0.027 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 ph/seg (deg) 0.0 0.0 Search (1024X32) 10000.001 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 amp/seg (%) 0.0 0.0 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 ph/frq (deg) 0.0 0.0 Inc. seg. avg. 10000.000 Sample rate(MISamp/s): 128 dr window (ns/s) -0.011 0.011  
 amp/frq (%) 0.0 0.0 Inc. frq. avg. 10000.001 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite ion window (TEC) 0.00 0.00

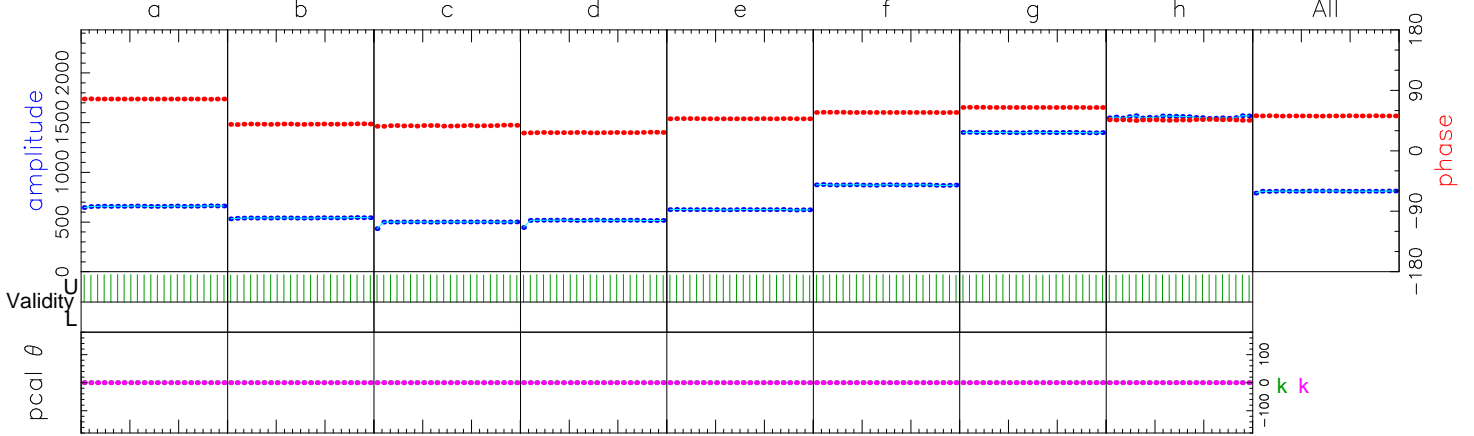
k: az 68.2 el 33.7 pa -71.5 k: az 68.2 el 33.7 pa -71.5 u,v (vr/asec) 0.000 0.000 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kk.W.121.18UHRL



Fringe quality 6  
SNR 29656.7  
Int time 178.644  
Amp 811.391  
Phase 51.9  
PFD 0.0e+00  
Delays (us)  
SBD 0.000506  
MBD 0.001446  
Fringe rate (Hz) -0.000006  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512  
Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143702  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"



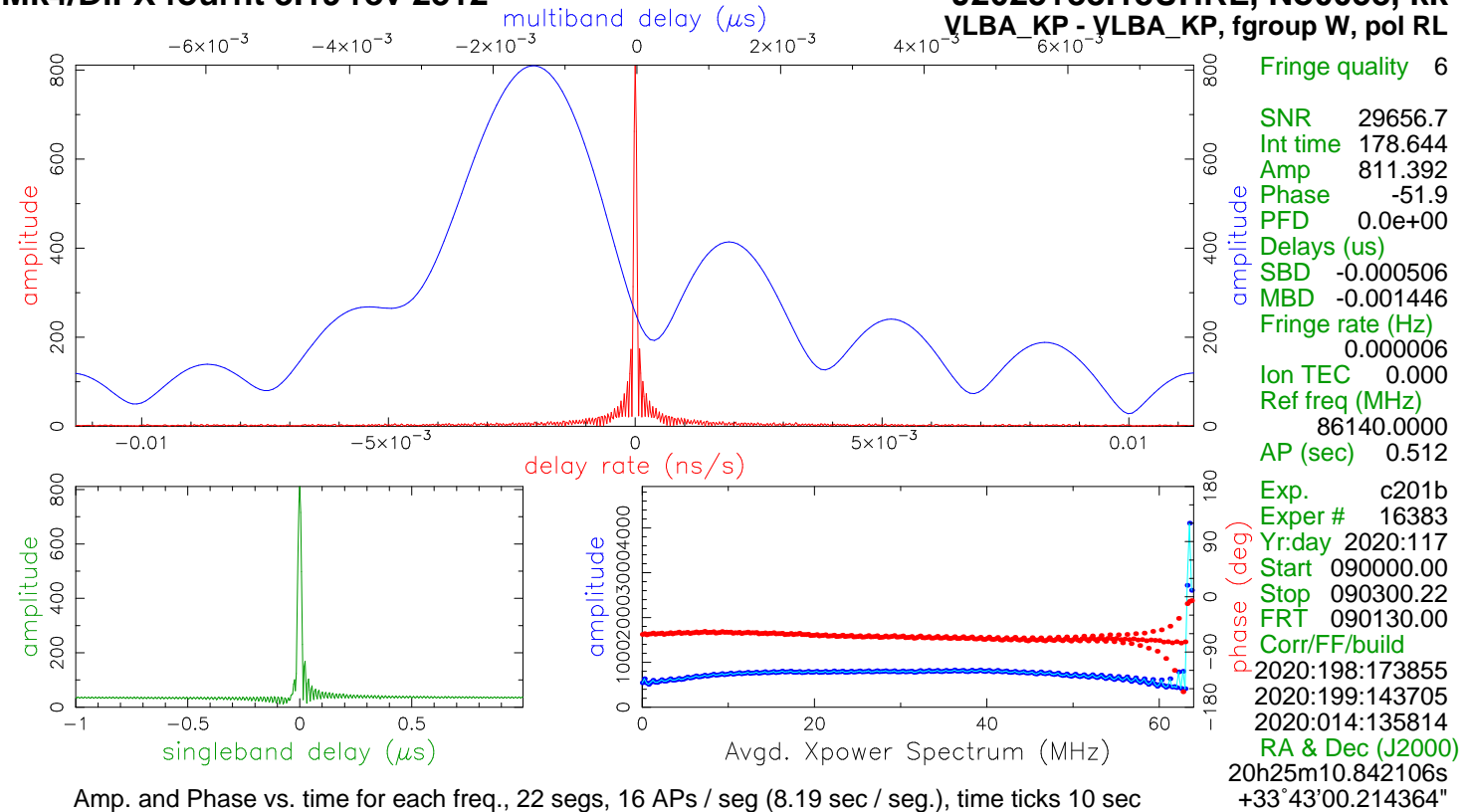
Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



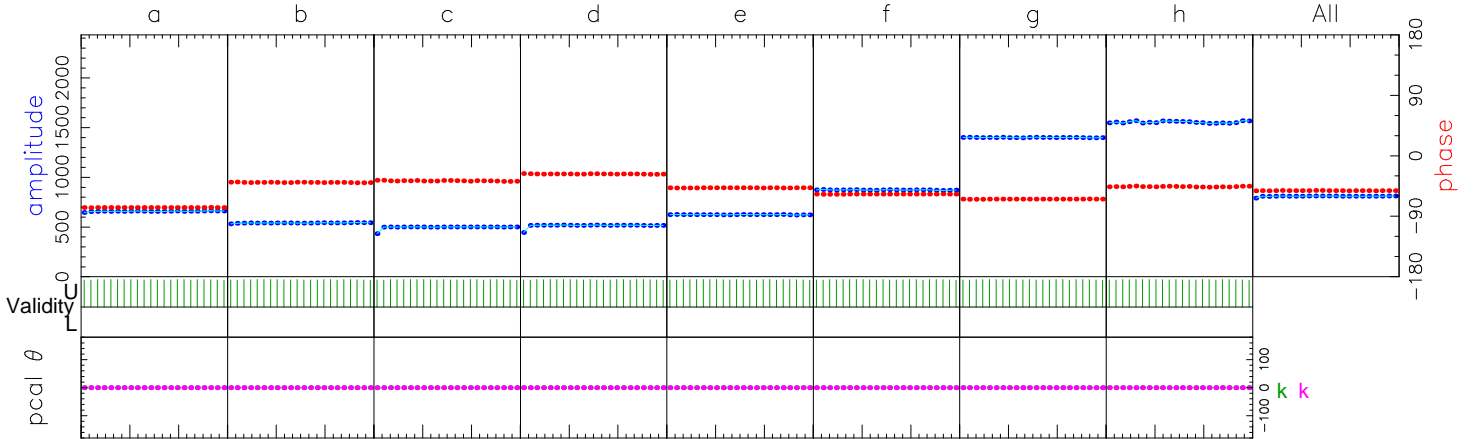
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
k:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
k	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		

Group delay (usec)(sbd)	1.44565625000E-03	Apriori delay (usec)	0.00000000000E+00	Resid mbdelay (usec)	1.44566E-03	+/-	3.7E-08
Sband delay (usec)	5.06250000000E-04	Apriori clock (usec)	0.0000000E+00	Resid sbdelay (usec)	5.06250E-04	+/-	2.9E-07
Phase delay (usec)	1.67306851160E-06	Apriori clockrate (us/s)	0.0000000E+00	Resid phdelay (usec)	1.67307E-06	+/-	1.2E-10
Delay rate (us/s)	-6.51873010017E-11	Apriori rate (us/s)	0.00000000000E+00	Resid rate (us/s)	-6.51873E-11	+/-	1.2E-12
Total phase (deg)	51.9	Apriori accel (us/s/s)	0.00000000000E+00	Resid phase (deg)	51.9	+/-	0.0

ph/seg (deg)	0.1	0.0	Amplitude	811.391 +/- 0.027	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
amp/seg (%)	0.5	0.0	Search (1024X32)	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	SampCntNorm: enabled	mb window (us)	-0.008	0.008
ph/frq (deg)	17.5	0.0	Inc. seg. avg.	810.102	Bits/sample: 2x2	Sample rate(MISamp/s): 128	dr window (ns/s)	-0.011	0.011
amp/frq (%)	48.2	0.0	Inc. frq. avg.	833.261	Data rate(Mb/s): 2048	nlags: 256	ion window (TEC)	0.00	0.00

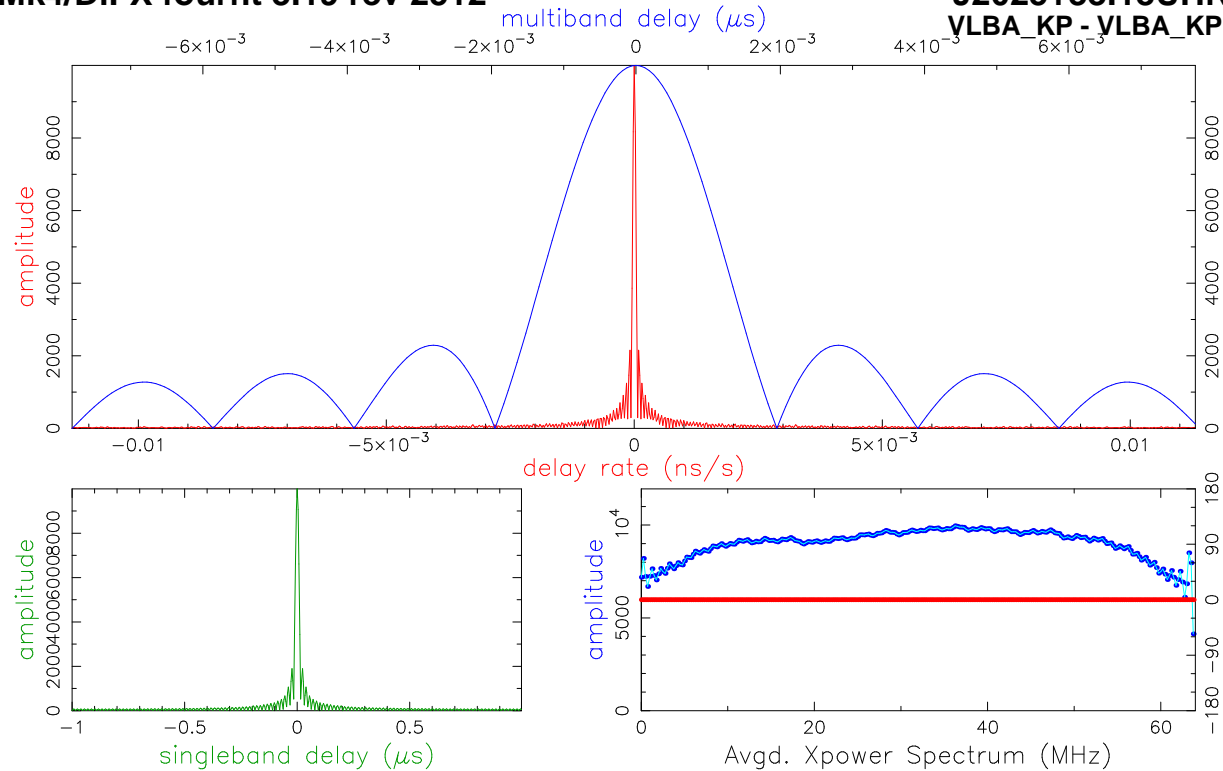


Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-77.0	-39.7	-37.3	-27.1	-47.7	-57.1	-64.4	-45.9	Phase	-51.9
	658.8	541.1	497.7	514.9	624.5	872.9	1400.7	1555.5	Ampl.	833.3
	256.8	257.2	256.6	256.7	256.3	256.7	256.4	257.5	Sbd box	256.9
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Tracks	
Group delay (usec)(sbd)	-1.44565625000E-03		Apriori delay (usec)		0.00000000000E+00		Resid mbdelay (usec)		-1.44566E-03	+/- 3.7E-08
Sband delay (usec)	-5.06250000000E-04		Apriori clock (usec)		0.0000000E+00		Resid sbdelay (usec)		-5.06250E-04	+/- 2.9E-07
Phase delay (usec)	-1.67306851181E-06		Apriori clockrate (us/s)		0.0000000E+00		Resid phdelay (usec)		-1.67307E-06	+/- 1.2E-10
Delay rate (us/s)	6.51873010017E-11		Apriori rate (us/s)		0.00000000000E+00		Resid rate (us/s)		6.51873E-11	+/- 1.2E-12
Total phase (deg)			Apriori accel (us/s/s)		0.00000000000E+00		Resid phase (deg)		-51.9	+/- 0.0

ph/seg (deg) 0.1 0.0 Theor. Amplitude 811.392 +/- 0.027 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 0.5 0.0 Search (1024X32) 809.863 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 17.5 0.0 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 48.2 0.0 Inc. seg. avg. 810.102 Sample rate(MISamp/s): 128 dr window (ns/s) -0.011 0.011  
 k: az 68.2 el 33.7 pa -71.5 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 0.000 0.000 nlags: 256 t\_cohere infinite ion window (TEC) 0.00 0.00  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kk.W.163.18UHRL simultaneous interpolator

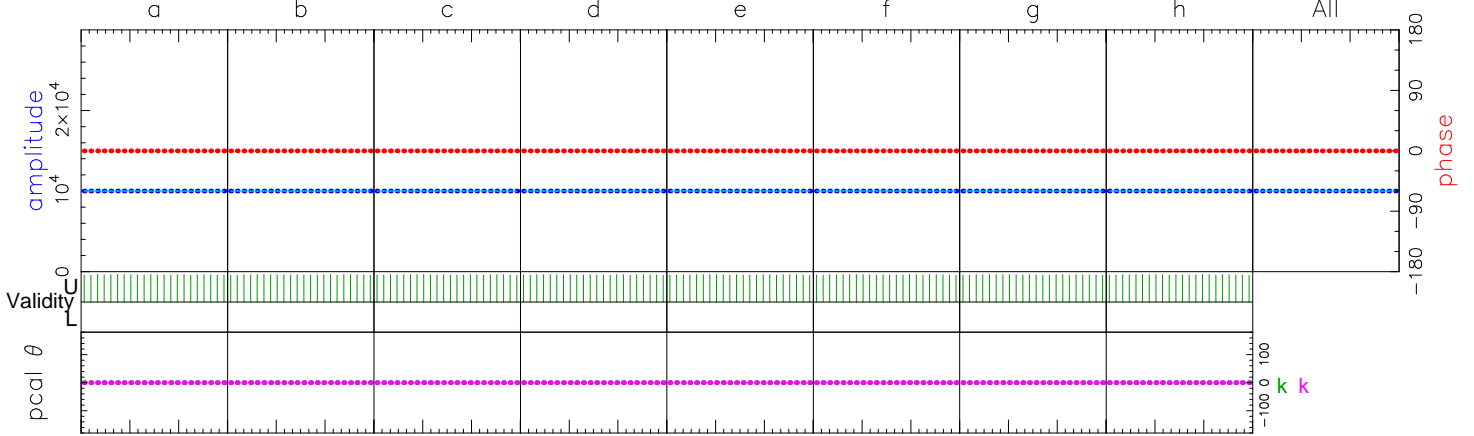


Fringe quality 9

SNR 365504.1  
Int time 178.644  
Amp 9999.999  
Phase 0.0  
PFD 0.0e+00  
Delays (us)  
SBD 0.000000  
MBD 0.000000  
Fringe rate (Hz) 0.000000  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512

Exp. c201b  
Yr:day 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143652  
2020:014:135814  
RA & Dec (J2000) 20h25m10.842106s +33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



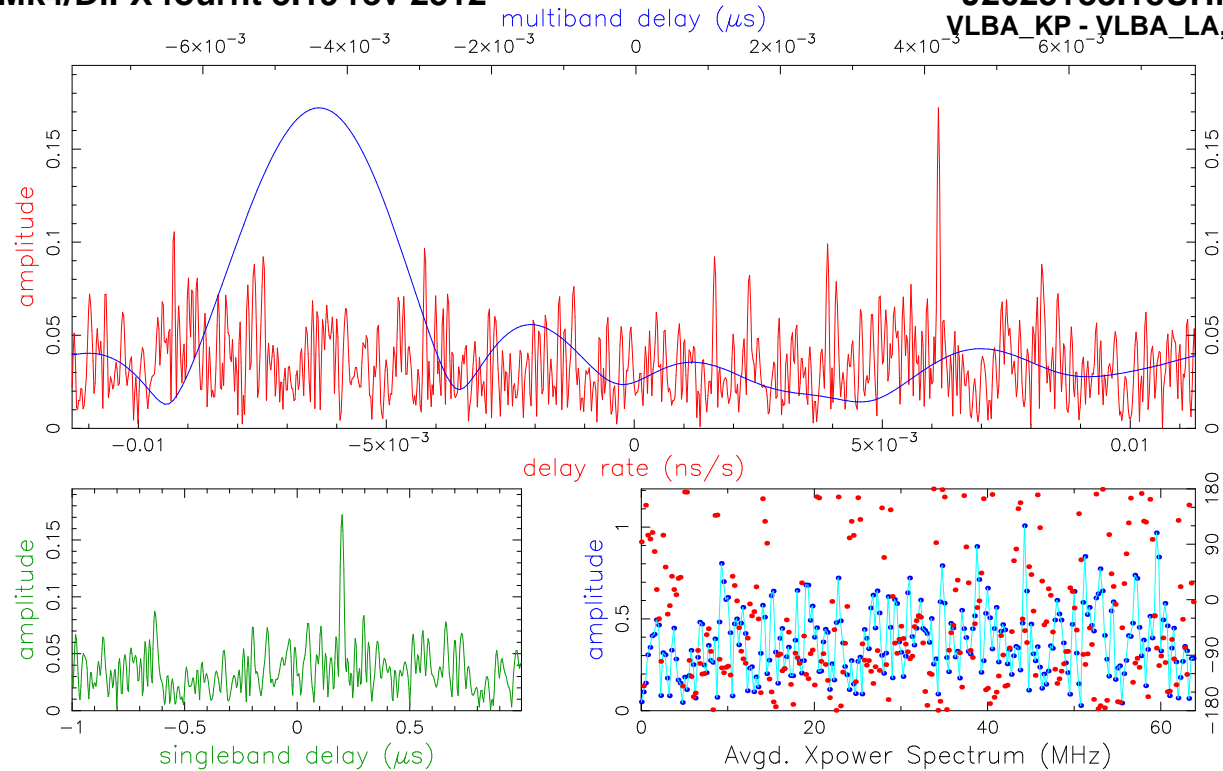
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	10000.0	10000.0
k	1000	1000	1000	1000	1000	1000	1000	1000	10000.0	10000.0
k:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	10000.0	10000.0
k:k	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	10000.0	10000.0
k	1000	1000	1000	1000	1000	1000	1000	1000	10000.0	10000.0
k	1000	1000	1000	1000	1000	1000	1000	1000	10000.0	10000.0
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	10000.0	10000.0
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	10000.0	10000.0

Group delay (usec)(sbd) 0.0000000000E+00 Apriori delay (usec) 0.0000000000E+00 Resid mbdelay (usec) 0.00000E+00 +/- 3.0E-09  
 Sband delay (usec) 0.0000000000E+00 Apriori clock (usec) 0.0000000E+00 Resid sbdelay (usec) 0.00000E+00 +/- 2.4E-08  
 Phase delay (usec) 1.36147457084E-19 Apriori clockrate (us/s) 0.0000000E+00 Resid phdelay (usec) 1.36147E-19 +/- 1.0E-11  
 Delay rate (us/s) 0.0000000000E+00 Apriori rate (us/s) 0.0000000000E+00 Resid rate (us/s) 0.00000E+00 +/- 9.7E-14  
 Total phase (deg) 0.0 Apriori accel (us/s/s) 0.0000000000E+00 Resid phase (deg) 0.0 +/- 0.0

RMS Theor. Amplitude 9999.999 +/- 0.027 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 ph/seg (deg) 0.0 0.0 Search (1024X32) 10000.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 amp/seg (%) 0.0 0.0 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 ph/frq (deg) 0.0 0.0 Inc. seg. avg. 10000.000 Sample rate(MISamp/s): 128 dr window (ns/s) -0.011 0.011  
 amp/frq (%) 0.0 0.0 Inc. frq. avg. 9999.999 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite ion window (TEC) 0.00 0.00

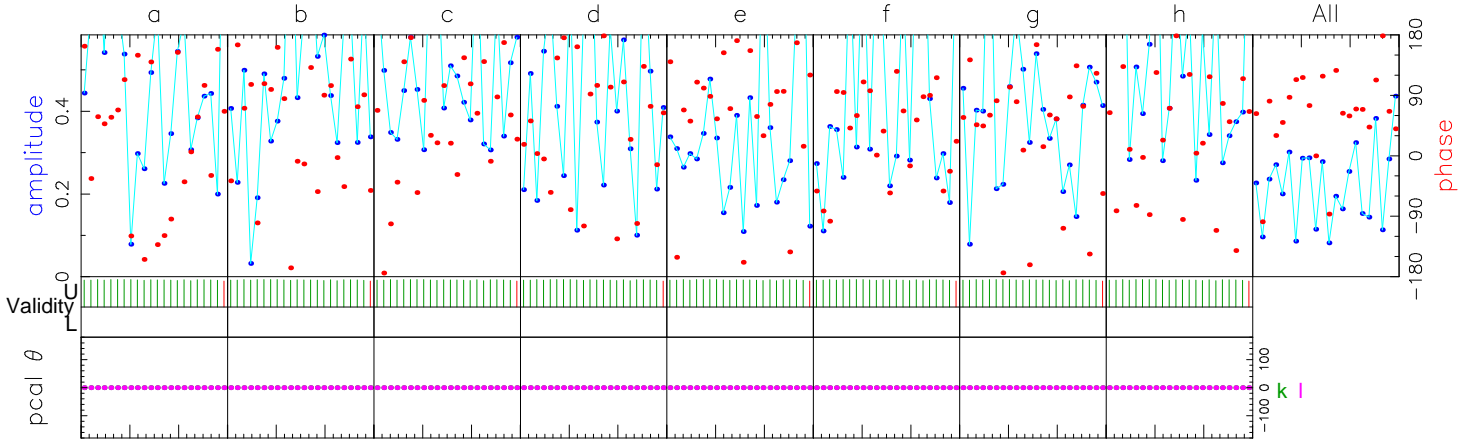
k: az 68.2 el 33.7 pa -71.5 k: az 68.2 el 33.7 pa -71.5 u,v (fr/asec) 0.000 0.000 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kk..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kk.W.91.18UHRL





Fringe quality 0  
SNR 6.3  
Int time 177.022  
Amp 0.195  
Phase 75.8  
PFD 4.9e-02  
Delays (us)  
SBD 0.199001  
MBD -0.004398  
Fringe rate (Hz) 0.529397  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512  
Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143656  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



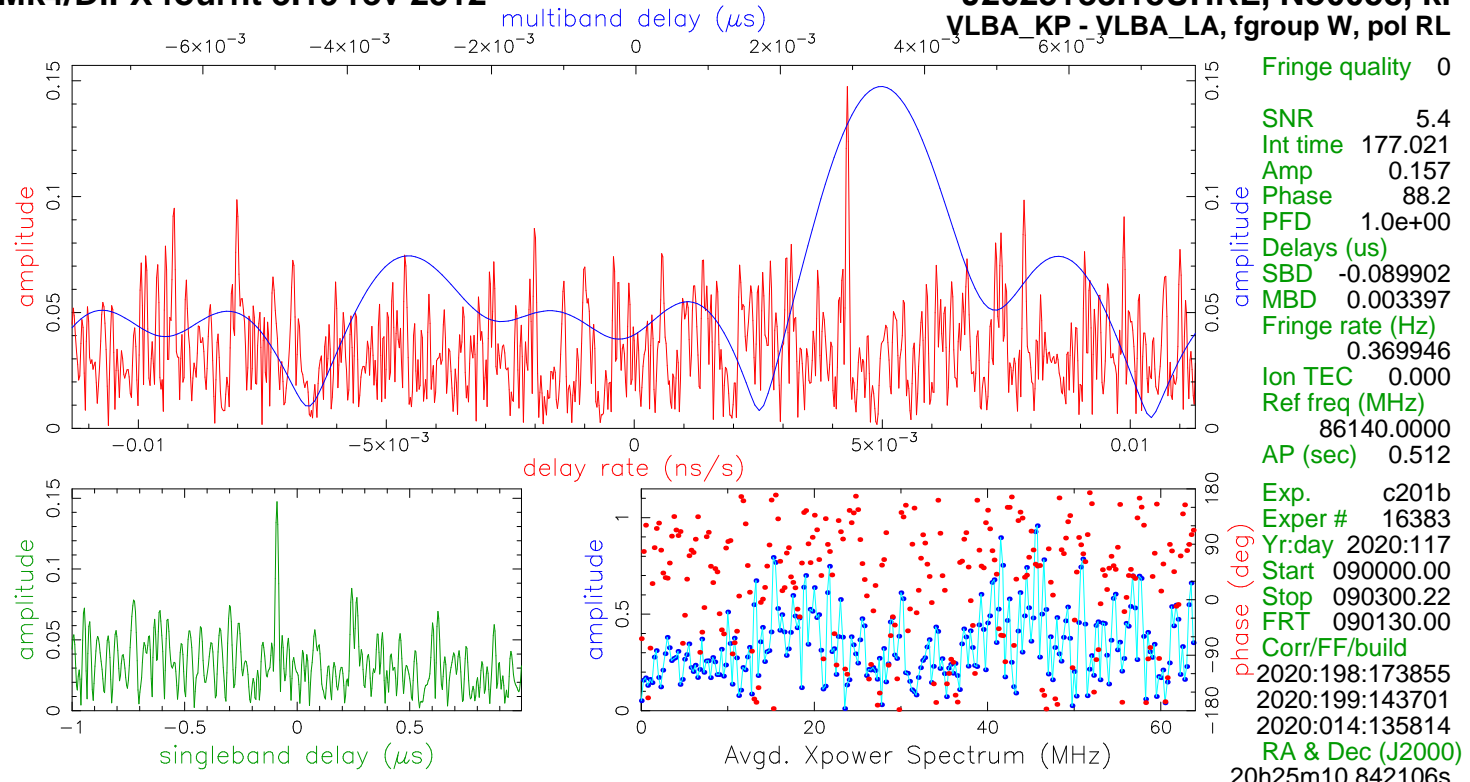
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
l	1000	1000	1000	1000	1000	1000	1000	1000		
k:l	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:l	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
l	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
l	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
Group delay (usec)(sbd)	-1.62424447732E+03				-1.62444320456E+03				-4.39776E-03	+/- 1.7E-04
Sband delay (usec)	-1.62424420331E+03				3.3619728E+00				1.99001E-01	+/- 1.4E-03
Phase delay (usec)	-1.62444320212E+03				1.5640000E-07				2.44289E-06	+/- 5.9E-07
Delay rate (us/s)	8.53347005546E-02				8.53285547823E-02				6.14577E-06	+/- 5.7E-09
Total phase (deg)			-154.9		5.18650786143E-06				75.8	+/- 18.3
	RMS	Theor.	Amplitude	0.195 +/- 0.031	Pcal mode: MANUAL, MANUAL				PC period (AP's) 5, 5	
ph/seg (deg)	63.2	42.9	Search (1024X32)	0.164	Pcal rate: 0.000E+00, 0.000E+00 (us/s)				sb window (us)	-1.000 1.000
amp/seg (%)	62.7	74.8	Interp.	0.000	Bits/sample: 2x2				mb window (us)	-0.008 0.008
ph/frq (deg)	16.9	25.9	Inc. seg. avg.	0.198	Sample rate(MISamp/s): 128				dr window (ns/s)	-0.011 0.011
amp/frq (%)	32.5	45.1	Inc. frq. avg.	0.183	Data rate(Mb/s): 2048				ion window (TEC)	0.00 0.00

k: az 68.2 el 33.7 pa -71.5 l: az 72.7 el 39.2 pa -68.9 u,v (fr/asec) -584.929 -131.595 simultaneous interpolator  
Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kl..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kl.W.109.18UHRL

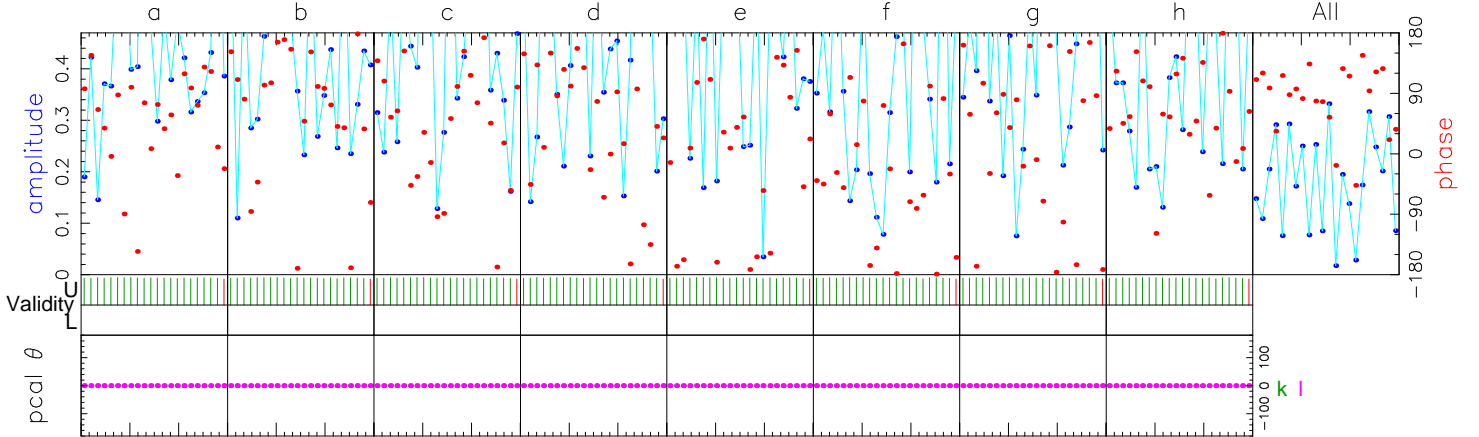
Mk4/DiFX fourfit 3.19 rev 2512

J2025+33.18UHRL, No0058, kl

VLBA\_KP - VLBA\_LA, fgroup W, pol RL



Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

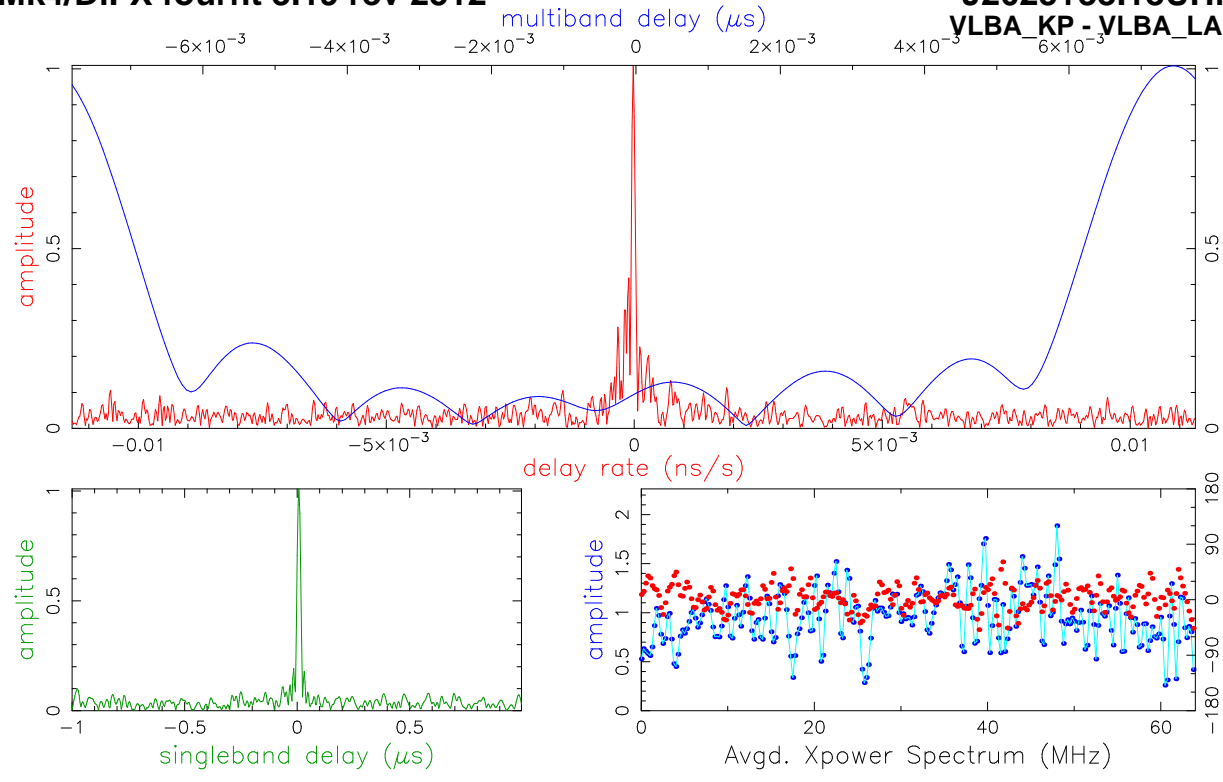


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
59.4	116.0	75.8	109.2	110.7	-29.0	121.3	63.6	63.6	Phase	88.2
0.2	0.2	0.2	0.2	0.1	0.2	0.1	0.2	0.3	Ampl.	0.2
327.0	183.2	134.7	278.9	21.9	319.0	374.5	341.0	341.0	Sbd box	234.0
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
l	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:l	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:l	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
l	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
l	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Tracks	
Group delay (usec)(sbd)	-1.62453355758E+03		Apriori delay (usec)	-1.62444320456E+03	Resid mbdelay (usec)	3.39698E-03	+/-	2.0E-04		
Sband delay (usec)	-1.62453310631E+03		Apriori clock (usec)	3.3619728E+00	Resid sbdelay (usec)	-8.99018E-02	+/-	1.6E-03		
Phase delay (usec)	-1.62444320172E+03		Apriori clockrate (us/s)	1.5640000E-07	Resid phdelay (usec)	2.84342E-06	+/-	6.9E-07		
Delay rate (us/s)	8.53328494889E-02		Apriori rate (us/s)	8.53285547823E-02	Resid rate (us/s)	4.29471E-06	+/-	6.6E-09		
Total phase (deg)		-142.5	Apriori accel (us/s/s)	5.18650786143E-06	Resid phase (deg)	88.2	+/-	21.3		

	RMS	Theor.	Amplitude	0.157 +/- 0.029	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5		
ph/seg (deg)	49.4	50.1	Search (1024X32)	0.146	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us) -1.000 1.000		
amp/seg (%)	68.2	87.4	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	mb window (us) -0.008 0.008	
ph/frq (deg)	55.0	30.2	Inc. seg. avg.	0.140	Sample rate(MISamp/s): 128	dr window (ns/s) -0.011 0.011		
amp/frq (%)	43.4	52.7	Inc. frq. avg.	0.162	Data rate(Mb/s): 2048	nlags: 256	t_cohere infinite	ion window (TEC) 0.00 0.00

k: az 68.2 el 33.7 pa -71.5 l: az 72.7 el 39.2 pa -68.9 u,v (fr/asec) -584.929 -131.595 simultaneous interpolator

Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kl..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kl.W.138.18UHRL

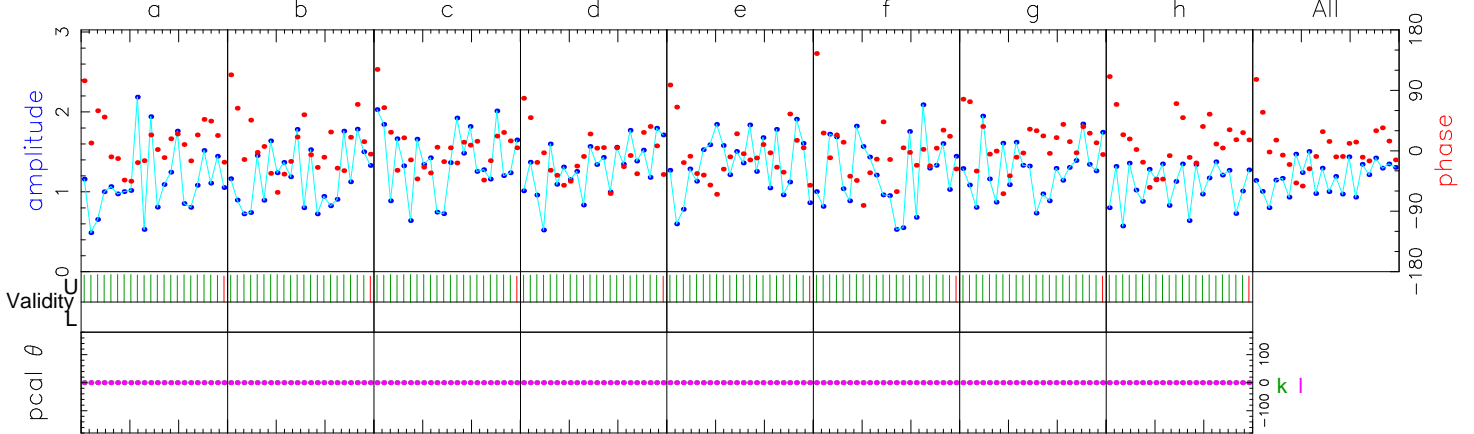


Fringe quality 8

SNR 36.7  
Int time 177.021  
Amp 1.010  
Phase 2.1  
PFD 0.0e+00  
Delays (us)  
SBD 0.007374  
MBD 0.007437  
Fringe rate (Hz)  
-0.002141  
Ion TEC 0.000  
Ref freq (MHz)  
86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143652  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



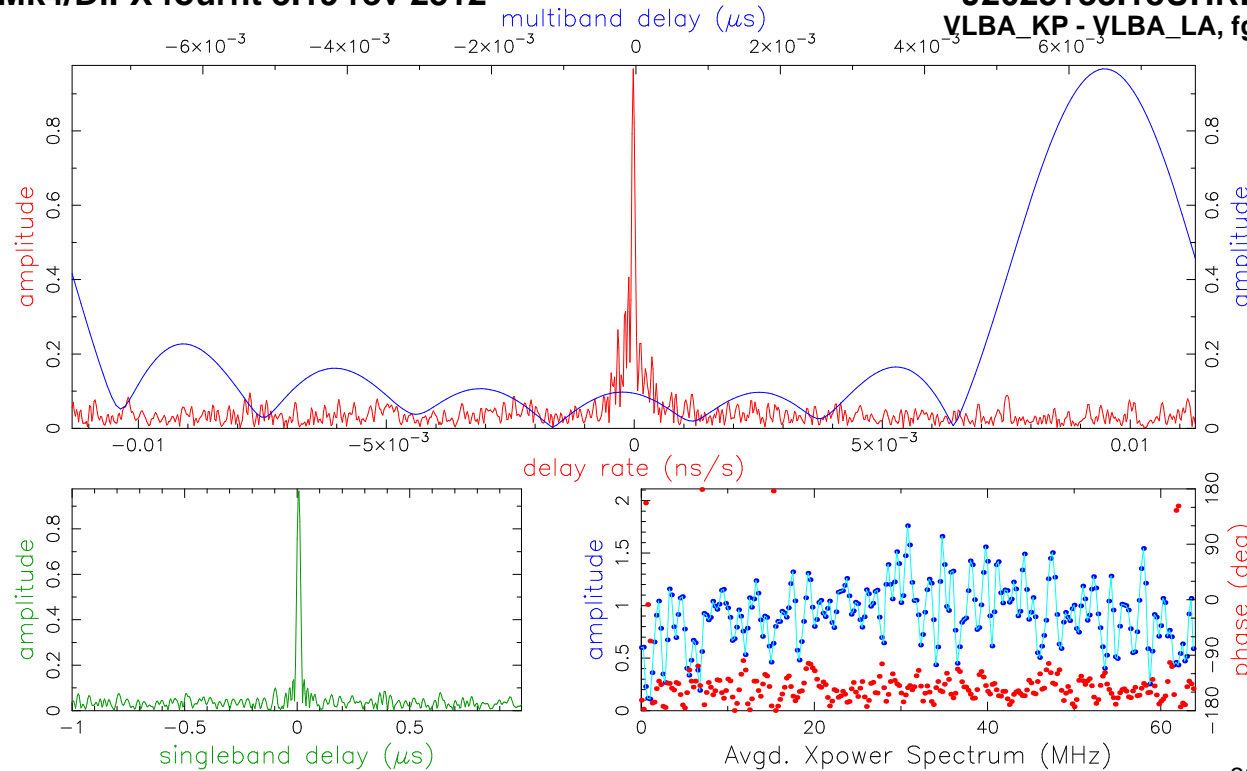
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
l	1000	1000	1000	1000	1000	1000	1000	1000		
k:l	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:l	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
l	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
l	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		

Group delay (usec)(sbd)	-1.62443576720E+03	Apriori delay (usec)	-1.62444320456E+03	Resid mbdelay (usec)	7.43736E-03	+/-	3.0E-05
Sband delay (usec)	-1.62443583006E+03	Apriori clock (usec)	3.3619728E+00	Resid sbdelay (usec)	7.37450E-03	+/-	2.3E-04
Phase delay (usec)	-1.62444320449E+03	Apriori clockrate (us/s)	1.5640000E-07	Resid phdelay (usec)	6.62825E-08	+/-	1.0E-07
Delay rate (us/s)	8.53285299261E-02	Apriori rate (us/s)	8.53285547823E-02	Resid rate (us/s)	-2.48562E-08	+/-	9.7E-10
Total phase (deg)	-228.6	Apriori accel (us/s/s)	5.18650786143E-06	Resid phase (deg)	2.1	+/-	3.1

ph/seg (deg)	33.7	Theor.	7.3	Amplitude	1.010 +/- 0.027	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5	
amp/seg (%)	26.3		12.8	Search (1024X32)	0.999	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000	
ph/frq (deg)	10.5		4.4	Interp.	0.000	Bits/sample:	2x2	SampCntNorm: enabled	mb window (us)	-0.008 0.008
amp/frq (%)	9.2		7.7	Inc. seg. avg.	1.180	Sample rate (MSamp/s):	128	dr window (ns/s)	-0.011 0.011	
				Inc. frq. avg.	1.018	Data rate (Mb/s):	2048	ion window (TEC)	0.00 0.00	

k: az 68.2 el 33.7 pa -71.5 l: az 72.7 el 39.2 pa -68.9 u,v (fr/asec) -584.929 -131.595 simultaneous interpolator

Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kl.18UHRL Output file: /Exps/c201b/v1/1234/No0058/kl.W.90.18UHRL

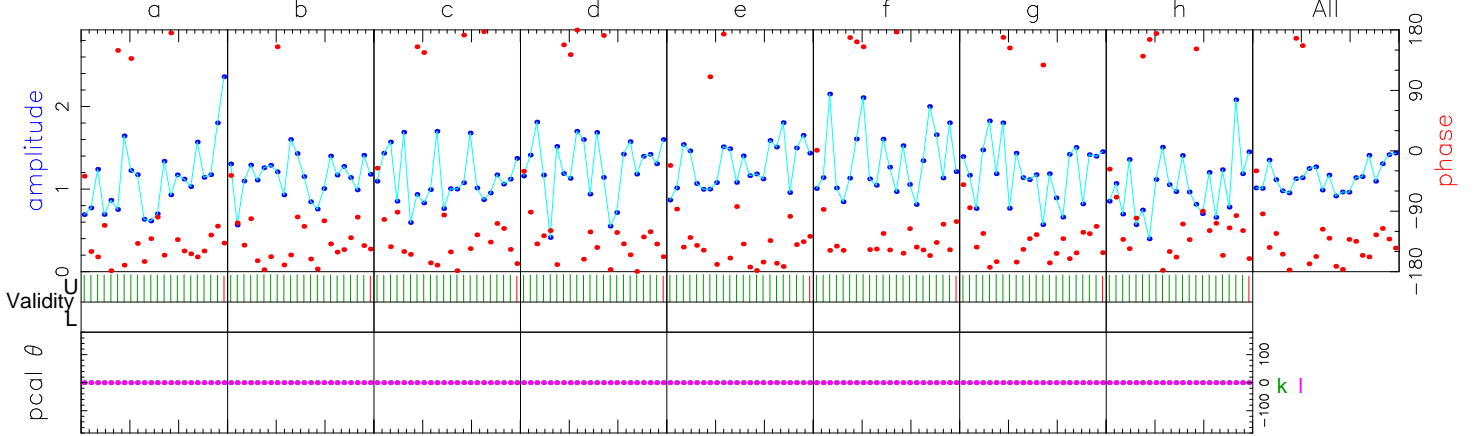


Fringe quality 8

SNR 35.5  
Int time 177.022  
Amp 0.976  
Phase -145.1  
PFD 0.0e+00  
Delays (us)  
SBD 0.006518  
MBD 0.006469  
Fringe rate (Hz)  
-0.002137  
Ion TEC 0.000  
Ref freq (MHz)  
86140.0000  
AP (sec) 0.512

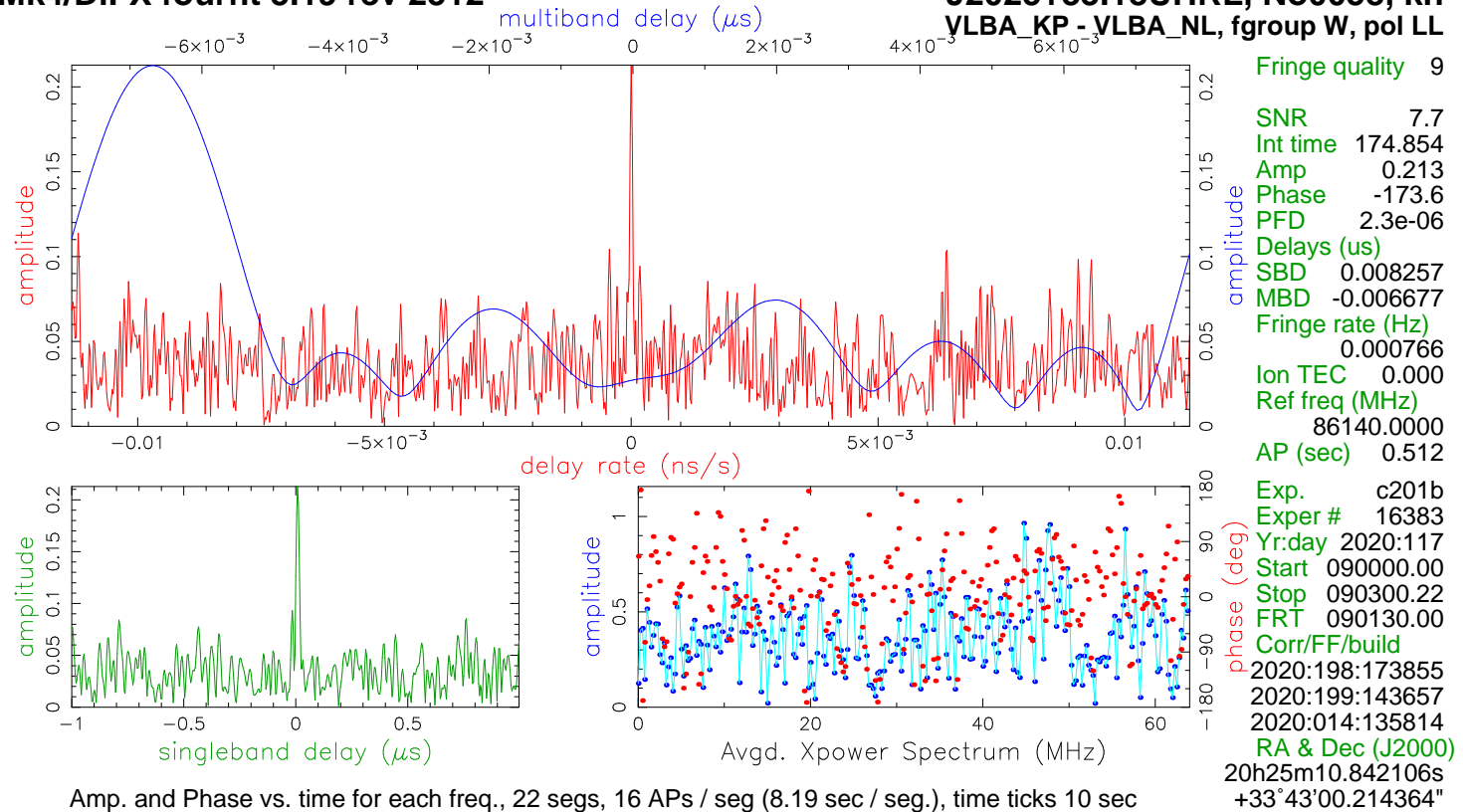
Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143653  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

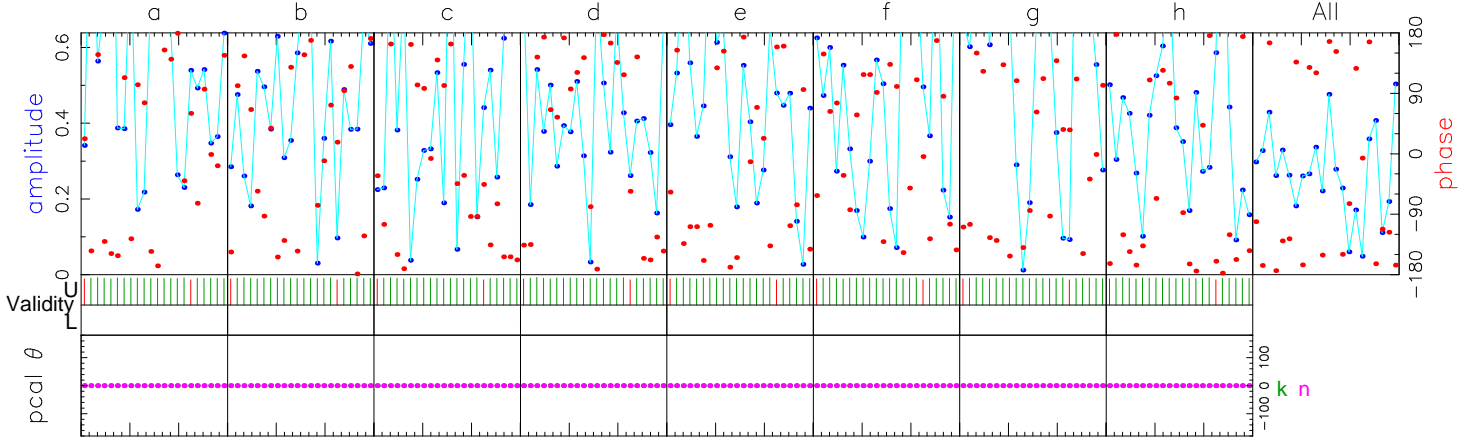


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
l	1000	1000	1000	1000	1000	1000	1000	1000		
k:l	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:l	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
l	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
l	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
Group delay (usec)(sbd)	-1.62443673548E+03	-1.62443668656E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03		
Sband delay (usec)	-1.62443668656E+03	-1.62443668656E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03		
Phase delay (usec)	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03	-1.6244320924E+03		
Delay rate (us/s)	8.53285299686E-02	8.53285299686E-02	8.53285299686E-02	8.53285299686E-02	8.53285299686E-02	8.53285299686E-02	8.53285299686E-02	8.53285299686E-02		
Total phase (deg)			-15.7							
Apriori delay (usec)										
Apriori clock (usec)										
Apriori clockrate (us/s)										
Apriori rate (us/s)										
Apriori accel (us/s/s)										
Resid mbdelay (usec)										
Resid sbdelay (usec)										
Resid phdelay (usec)										
Resid rate (us/s)										
Resid phase (deg)										
Pcal mode: MANUAL, MANUAL										
Pcal rate: 0.000E+00, 0.000E+00 (us/s)										
Bits/sample: 2x2										
Sample rate(MISamp/s): 128										
Data rate(Mb/s): 2048										
sb window (us)										
mb window (us)										
dr window (ns/s)										
ion window (TEC)										
PC period (AP's) 5, 5										
SampCntNorm: enabled										
nlags: 256 t_cohere infinite										
simultaneous interpolator										

ph/seg (deg) 36.1 7.6 Search (1024X32) 0.956 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
amp/seg (%) 23.7 13.2 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
ph/frq (deg) 5.7 4.6 Inc. seg. avg. 1.134 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
amp/frq (%) 9.4 8.0 Inc. frq. avg. 0.967 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
k: az 68.2 el 33.7 pa -71.5 l: az 72.7 el 39.2 pa -68.9 u,v (fr/asec) -584.929 -131.595 ion window (TEC) 0.00 0.00  
Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kl..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kl.W.96.18UHRL



Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

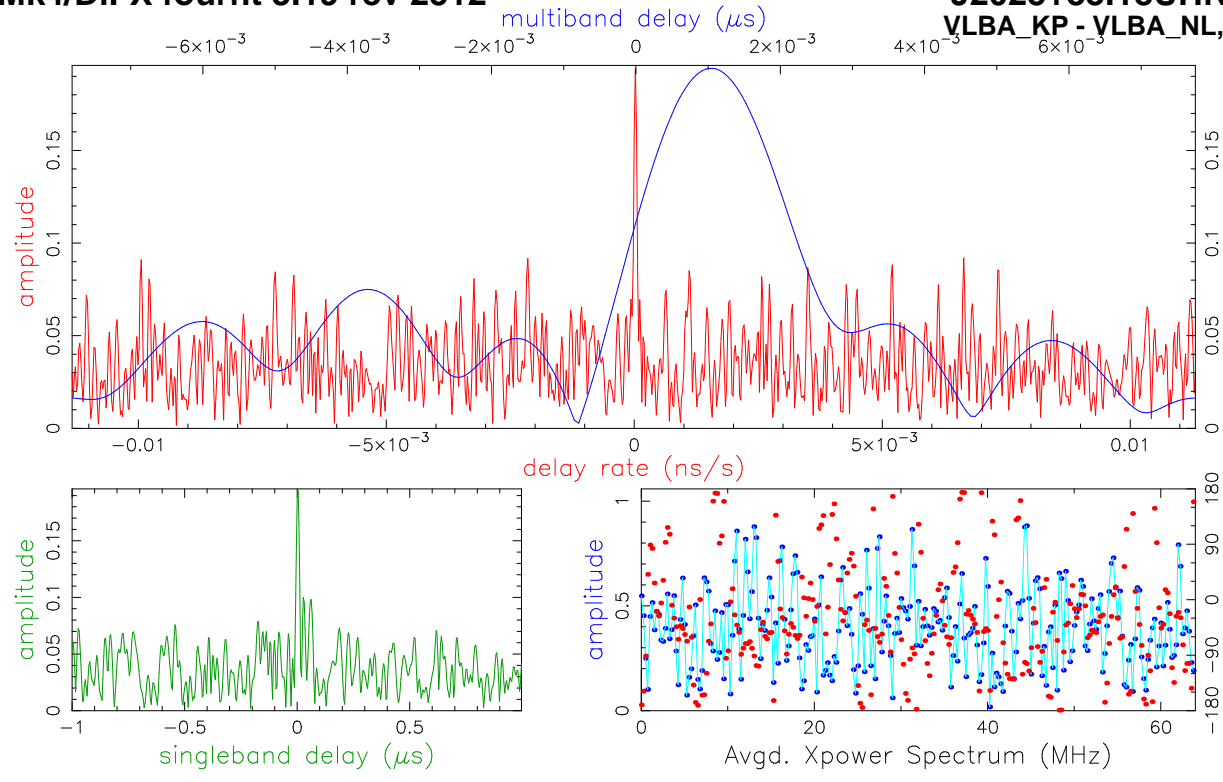


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-171.6	168.8	-154.7	165.2	-150.7	-178.2	-179.7	-176.8	Phase	-173.6
	0.3	0.2	0.3	0.3	0.3	0.1	0.2	0.2	Ampl.	0.2
	2.7	18.9	160.1	511.6	259.6	320.0	462.4	319.8	Sbd box	259.1
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
n	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:n	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:n	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
n	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
n	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-4.85598603589E+03		Apriori delay (usec)	-4.85599498361E+03	Resid mbdelay (usec)	-6.67728E-03	+/-	1.4E-04		
Sband delay (usec)	-4.85598672661E+03		Apriori clock (usec)	-3.2635166E+01	Resid sbdelay (usec)	8.25700E-03	+/-	1.1E-03		
Phase delay (usec)	-4.85599498921E+03		Apriori clockrate (us/s)	-3.2859999E-07	Resid phdelay (usec)	-5.59667E-06	+/-	4.8E-07		
Delay rate (us/s)	3.00698843320E-01		Apriori rate (us/s)	3.00698834421E-01	Resid rate (us/s)	8.89807E-09	+/-	4.6E-09		
Total phase (deg)		-133.4	Apriori accel (us/s/s)	1.70732014089E-05	Resid phase (deg)	-173.6	+/-	14.9		

	RMS	Theor.	Amplitude	0.213 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5				
ph/seg (deg)	56.5	34.9	Search (1024X32)	0.203	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000	1.000		
amp/seg (%)	62.2	60.9	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	mb window (us)	-0.008	0.008	
ph/frq (deg)	16.9	21.1	Inc. seg. avg.	0.231	Sample rate(MISamp/s): 128		dr window (ns/s)	-0.011	0.011	
amp/frq (%)	27.8	36.7	Inc. frq. avg.	0.207	Data rate(Mb/s): 2048	nlags: 256	t_cohere infinite	ion window (TEC)	0.00	0.00

k: az 68.2 el 33.7 pa -71.5      n: az 85.8 el 51.6 pa -63.4      u,v (fr/asec) -2061.361 -98.386      simultaneous interpolator

Control file: cf\_1234\_gmva      Input file: /Exps/c201b/v1/1234/No0058/kn..18UHRL      Output file: /Exps/c201b/v1/1234/No0058/kn.W.112.18UHRL

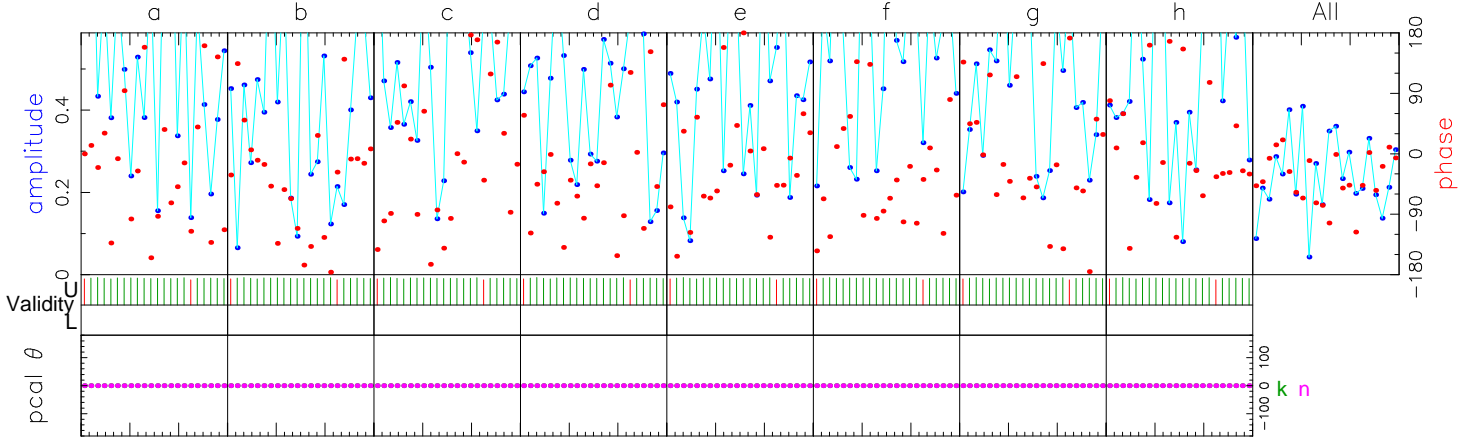


Fringe quality 0

SNR 7.1  
Int time 174.854  
Amp 0.196  
Phase -35.7  
PFD 2.1e-04  
Delays (us)  
SBD 0.002758  
MBD 0.001008  
Fringe rate (Hz) 0.002077  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143702  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



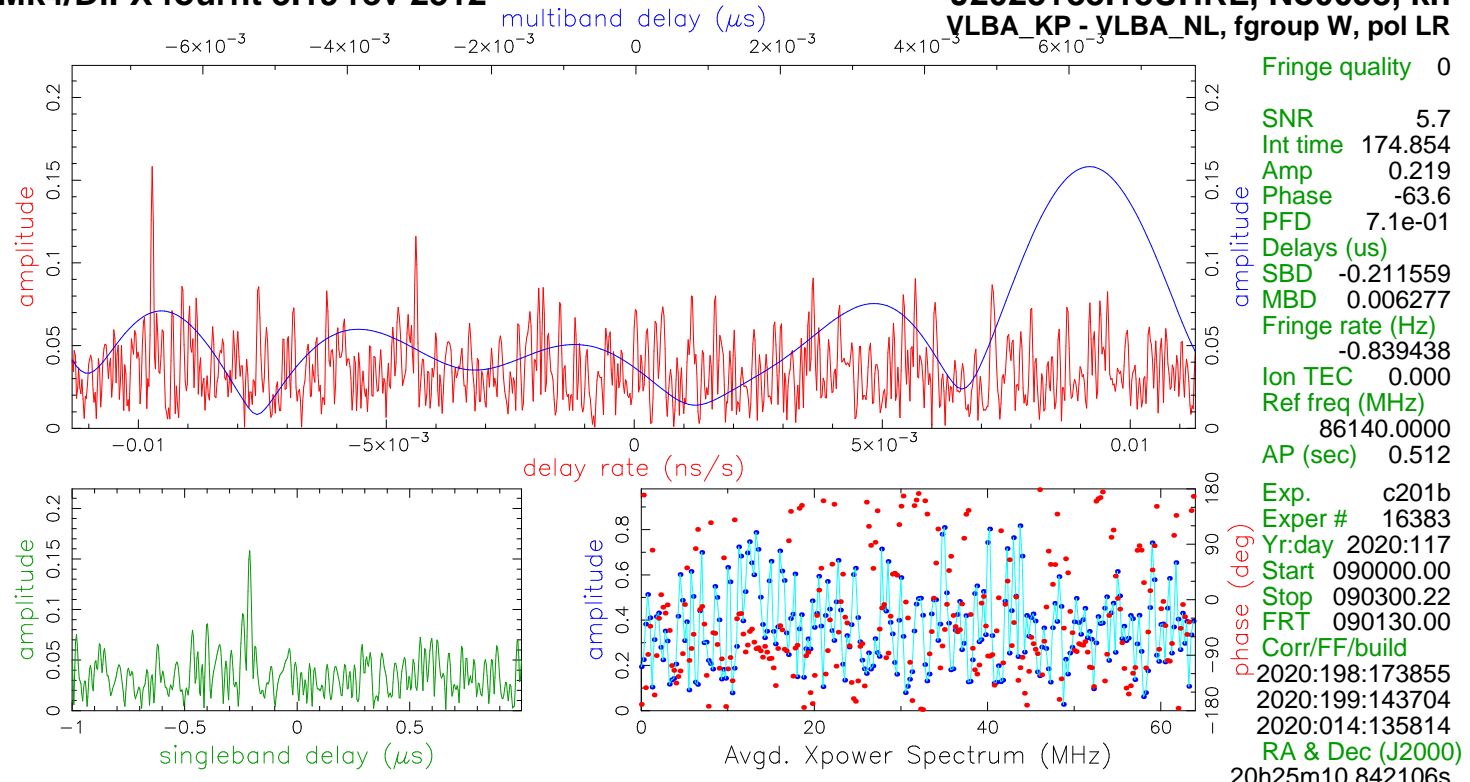
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
n	1000	1000	1000	1000	1000	1000	1000	1000		
k:n	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:n	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
n	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
n	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
Group delay (usec)(sbd)	-4.85599397553E+03				-4.85599498361E+03				1.00808E-03	+/- 1.5E-04
Sband delay (usec)	-4.85599222536E+03				-3.2635166E+01				2.75825E-03	+/- 1.2E-03
Phase delay (usec)	-4.85599498476E+03				-3.2859999E-07				-1.14976E-06	+/- 5.2E-07
Delay rate (us/s)	3.00698858529E-01				3.00698834421E-01				2.41080E-08	+/- 5.0E-09
Total phase (deg)			-355.5		1.70732014089E-05				-35.7	+/- 16.2
	RMS	Theor.	Amplitude	0.196 +/- 0.028						
ph/seg (deg)	36.7	37.9	Search (1024X32)	0.193						
amp/seg (%)	53.0	66.2	Interp.	0.000						
ph/frq (deg)	21.5	22.9	Inc. seg. avg.	0.199						
amp/frq (%)	33.6	39.9	Inc. frq. avg.	0.188						

Group delay (usec)(sbd) -4.85599397553E+03 Apriori delay (usec) -4.85599498361E+03 Resid mbdelay (usec) 1.00808E-03 +/- 1.5E-04  
 Sband delay (usec) -4.85599222536E+03 Apriori clock (usec) -3.2635166E+01 Resid sbdelay (usec) 2.75825E-03 +/- 1.2E-03  
 Phase delay (usec) -4.85599498476E+03 Apriori clockrate (us/s) -3.2859999E-07 Resid phdelay (usec) -1.14976E-06 +/- 5.2E-07  
 Delay rate (us/s) 3.00698858529E-01 Apriori rate (us/s) 3.00698834421E-01 Resid rate (us/s) 2.41080E-08 +/- 5.0E-09  
 Total phase (deg) -355.5 Apriori accel (us/s/s) 1.70732014089E-05 Resid phase (deg) -35.7 +/- 16.2

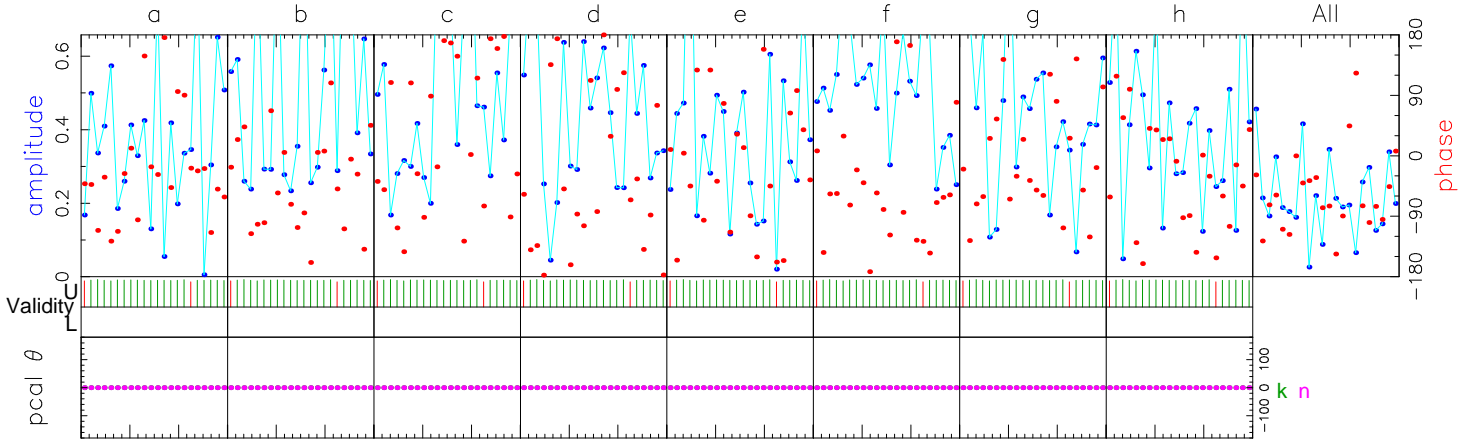
pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 Pcal rate: 0.000E+00, 0.000E+00 (us/s)  
 Bits/sample: 2x2 SampCntNorm: enabled  
 Sample rate(MISamp/s): 128  
 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite

sb window (us) -1.000 1.000  
 mb window (us) -0.008 0.008  
 dr window (ns/s) -0.011 0.011  
 ion window (TEC) 0.00 0.00

k: az 68.2 el 33.7 pa -71.5 n: az 85.8 el 51.6 pa -63.4 u,v (fr/asec) -2061.361 -98.386 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kn.18UHRL Output file: /Exps/c201b/v1/1234/No0058/kn.W.143.18UHRL



Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

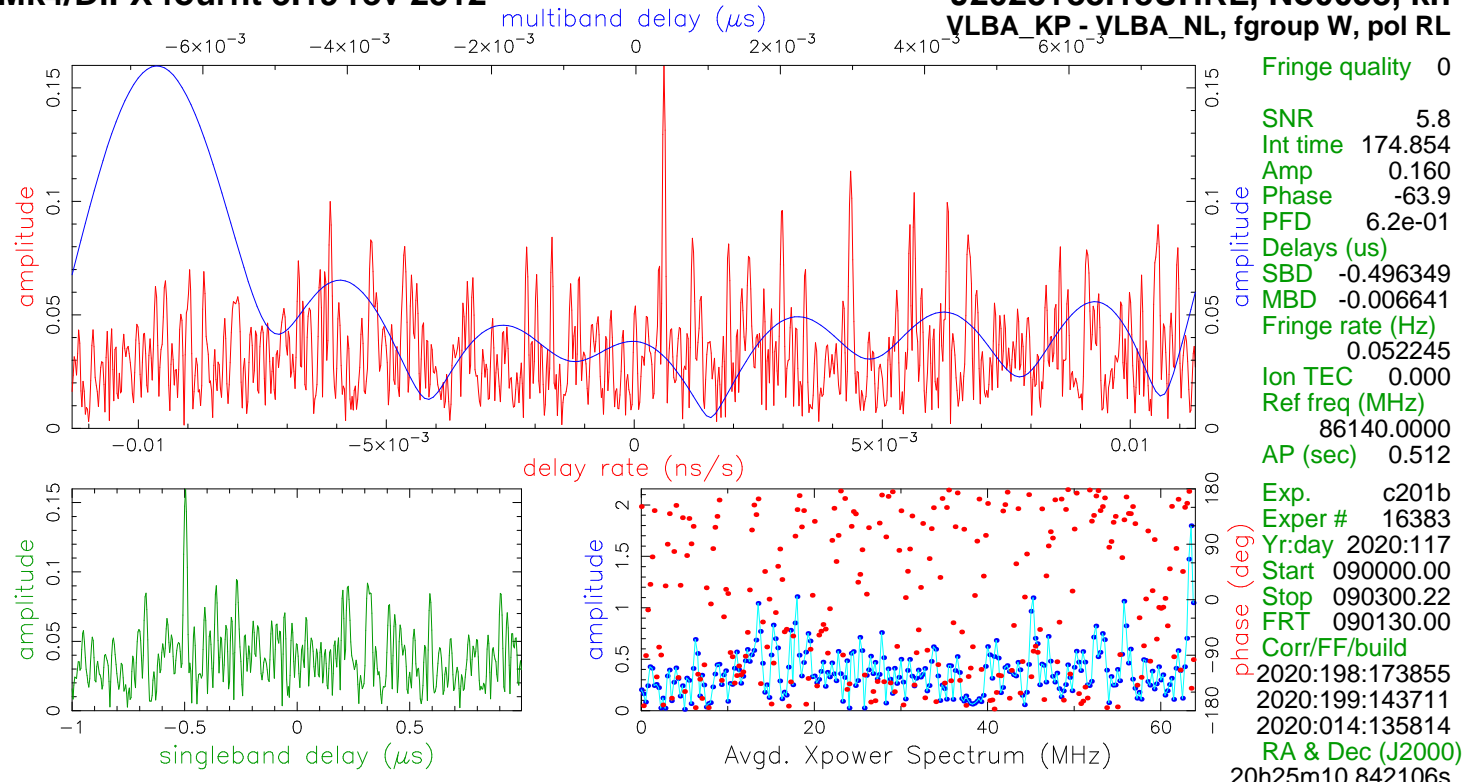


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-47.8	-52.4	-93.0	-117.9	-15.9	-86.1	-47.1	-40.2	Phase	-63.6
	0.3	0.3	0.1	0.3	0.2	0.4	0.3	0.1	Ampl.	0.2
	428.4	197.4	144.5	169.6	391.0	203.0	484.6	138.1	Sbd box	202.8
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
n	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:n	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:n	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
n	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
n	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-4.85620745624E+03		Apriori delay (usec)		-4.85599498361E+03		Resid mbdelay (usec)		6.27737E-03	+/- 1.9E-04
Sband delay (usec)	-4.85620654286E+03		Apriori clock (usec)		-3.2635166E+01		Resid sbdelay (usec)		-2.11559E-01	+/- 1.5E-03
Phase delay (usec)	-4.85599498567E+03		Apriori clockrate (us/s)		-3.2859999E-07		Resid phdelay (usec)		-2.05236E-06	+/- 6.4E-07
Delay rate (us/s)	3.00689089375E-01		Apriori rate (us/s)		3.00698834421E-01		Resid rate (us/s)		-9.74505E-06	+/- 6.2E-09
Total phase (deg)			Apriori accel (us/s/s)		1.70732014089E-05		Resid phase (deg)		-63.6	+/- 20.0

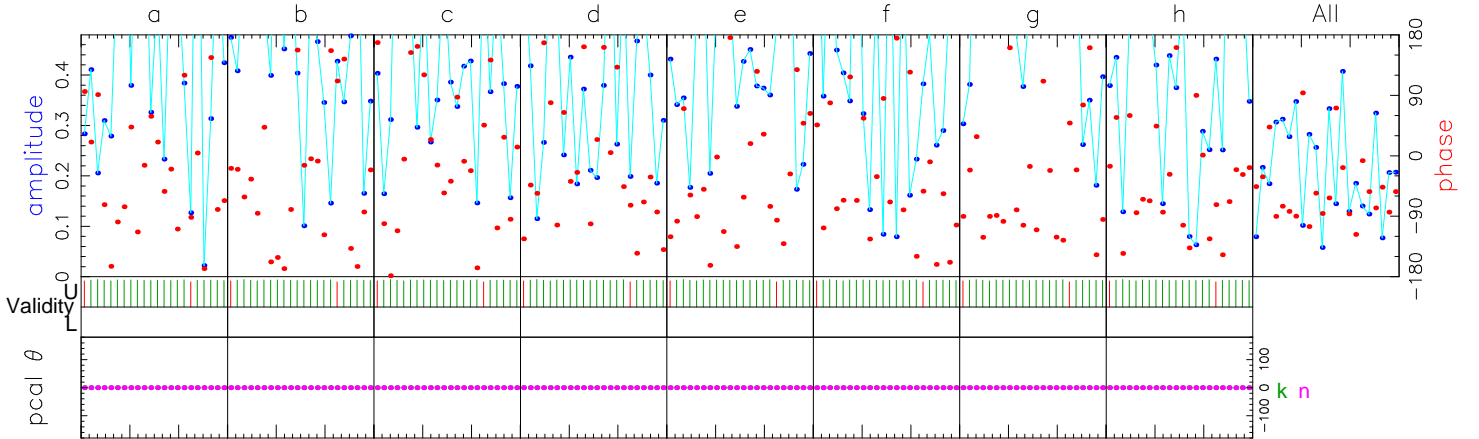
	RMS	Theor.	Amplitude	0.219 +/- 0.038	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
ph/seg (deg)	58.2	46.9	Search (1024X32)	0.155	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.008	0.008
amp/seg (%)	76.9	81.8	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
ph/frq (deg)	36.0	28.3	Inc. seg. avg.	0.226	Sample rate(MISamp/s): 128		ion window (TEC)	0.00	0.00
amp/frq (%)	39.4	49.3	Inc. frq. avg.	0.224	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite			

Mk4/DiFX fourfit 3.19 rev 2512

J2025+33.18UHRL, No0058, kn  
VLBA\_KP - VLBA\_NL, fgroup W, pol RL



Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



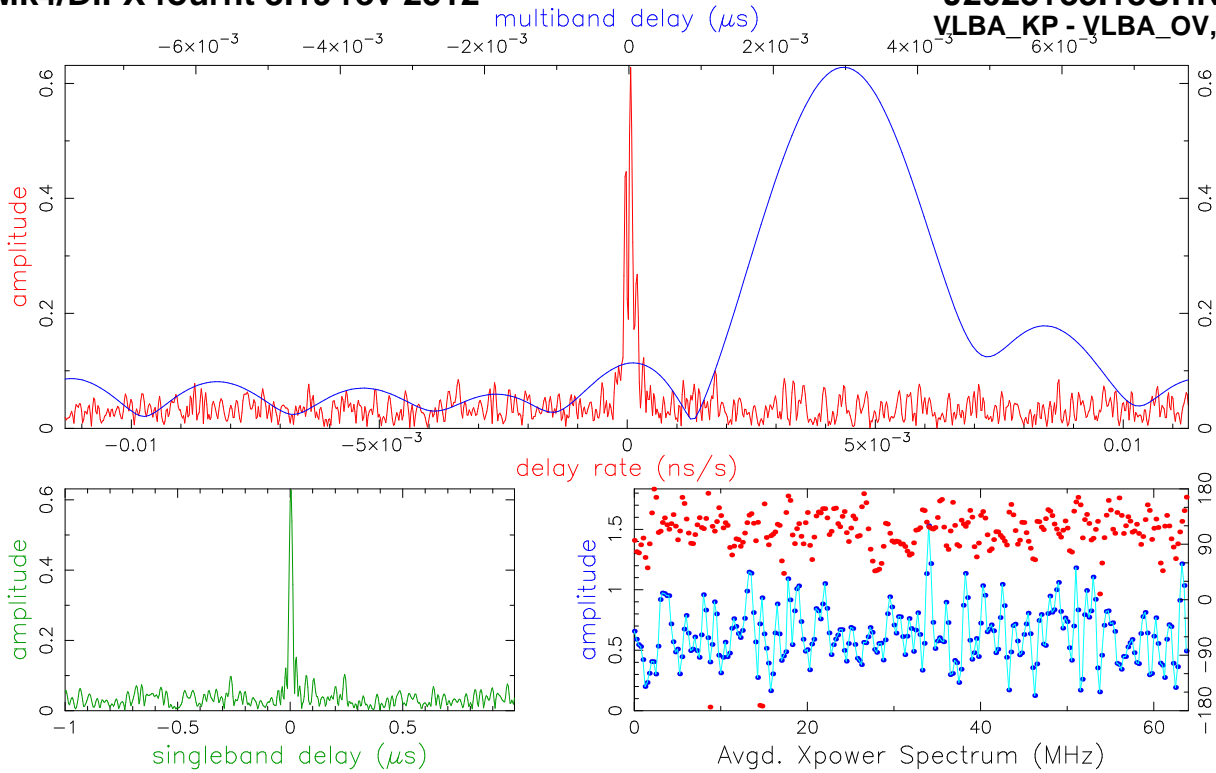
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-44.2	-90.9	-28.1	-71.1	-73.2	-62.1	-80.3	-46.2	Phase	-63.9
	0.2	0.2	0.0	0.1	0.2	0.2	0.2	0.3	Ampl.	0.1
	253.6	290.9	487.2	49.6	224.0	191.6	30.8	166.0	Sbd box	129.9
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
n	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:n	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:n	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Manl PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
n	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
n	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-4.8564859958E+03		Apriori delay (usec)	-4.85599498361E+03	Resid mbdelay (usec)	-6.64097E-03	+/-	1.9E-04		
Sband delay (usec)	-4.85649133236E+03		Apriori clock (usec)	-3.2635166E+01	Resid sbdelay (usec)	-4.96349E-01	+/-	1.5E-03		
Phase delay (usec)	-4.85599498567E+03		Apriori clockrate (us/s)	-3.2859999E-07	Resid phdelay (usec)	-2.05961E-06	+/-	6.4E-07		
Delay rate (us/s)	3.00699440937E-01		Apriori rate (us/s)	3.00698834421E-01	Resid rate (us/s)	6.06515E-07	+/-	6.1E-09		
Total phase (deg)		-23.7	Apriori accel (us/s/s)	1.70732014089E-05	Resid phase (deg)	-63.9	+/-	19.8		

	RMS	Theor.	Amplitude	0.160 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
ph/seg (deg)	56.5	46.5	Search (1024X32)	0.152	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.008	0.008
amp/seg (%)	70.1	81.2	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
ph/frq (deg)	22.8	28.1	Inc. seg. avg.	0.161	Sample rate(MISamp/s): 128		ion window (TEC)	0.00	0.00
amp/frq (%)	37.9	49.0	Inc. frq. avg.	0.150	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite			

k: az 68.2 el 33.7 pa -71.5      n: az 85.8 el 51.6 pa -63.4      u,v (fr/asec) -2061.361 -98.386      simultaneous interpolator

Control file: cf\_1234\_gmva      Input file: /Exps/c201b/v1/1234/No0058/kn..18UHRL      Output file: /Exps/c201b/v1/1234/No0058/kn.W.199.18UHRL



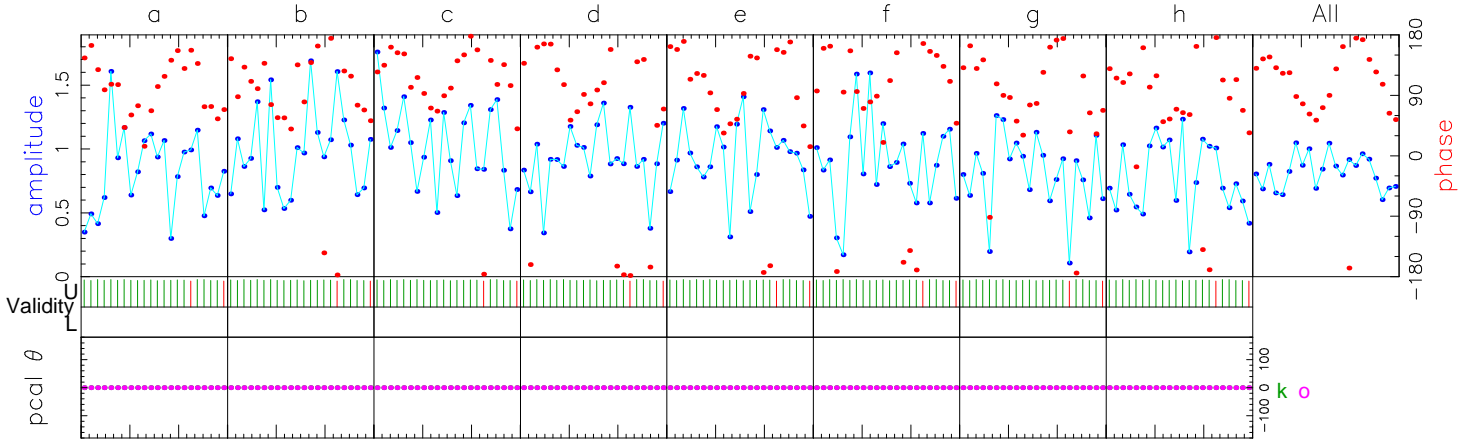


Fringe quality 9

SNR 22.9  
Int time 175.754  
Amp 0.631  
Phase 117.4  
PFD 0.0e+00  
Delays (us)  
SBD 0.002991  
MBD 0.002957  
Fringe rate (Hz) 0.005391  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143655  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



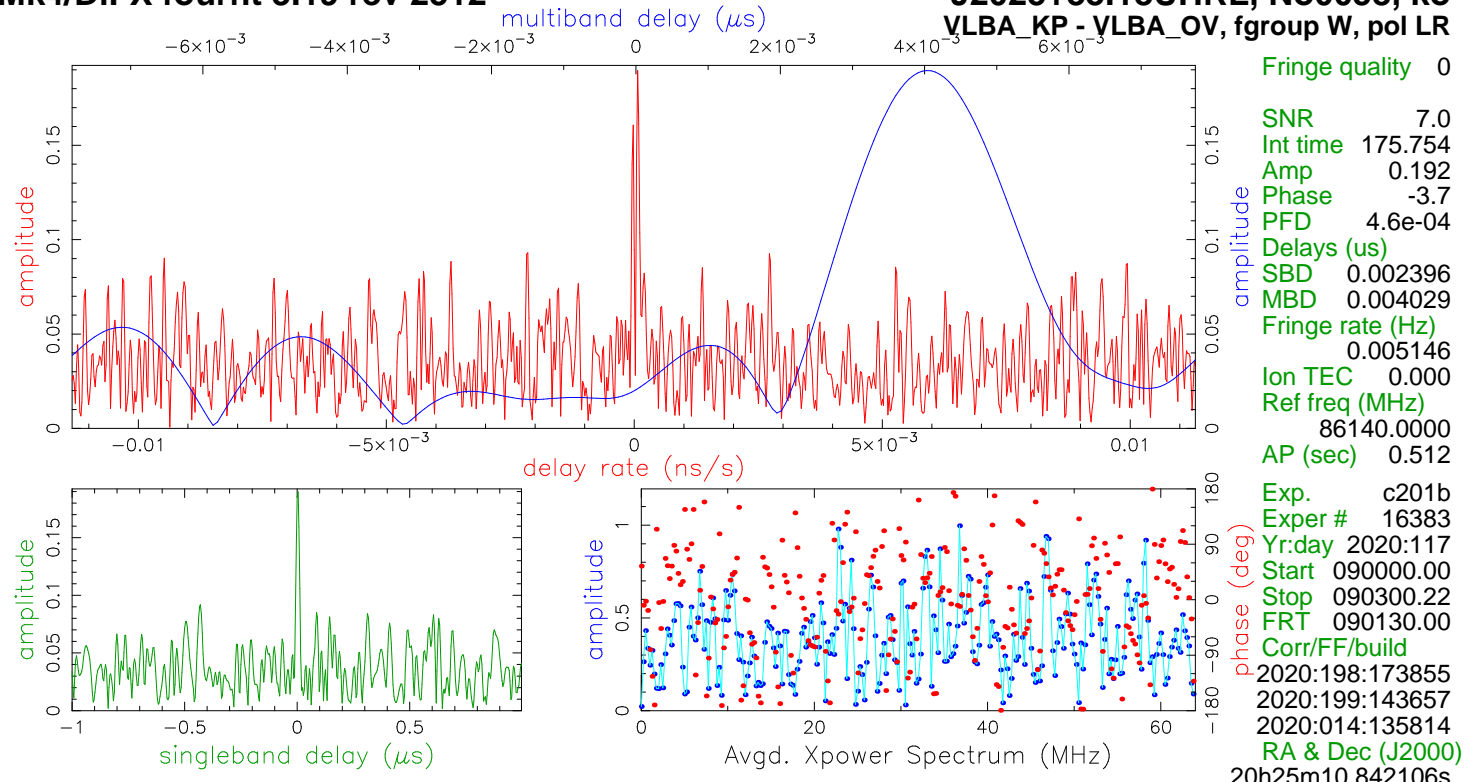
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
o	1000	1000	1000	1000	1000	1000	1000	1000		
k:o	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:o	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
o	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
o	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
Group delay (usec)(sbd)	9.86115584859E+02				9.86112627522E+02				2.95734E-03	+/- 4.7E-05
Sband delay (usec)	9.86115618772E+02				-2.0434479E+01				2.99125E-03	+/- 3.8E-04
Phase delay (usec)	9.86112631309E+02				-1.9560001E-07				3.78646E-06	+/- 1.6E-07
Delay rate (us/s)	2.39028088366E-02				2.39027462582E-02				6.25784E-08	+/- 1.6E-09
Total phase (deg)			21.9		-1.00984490377E-05				117.4	+/- 5.0
	RMS	Theor.	Amplitude	0.631 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5				
ph/seg (deg)	40.7	11.7	Search (1024X32)	0.623	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000	1.000		
amp/seg (%)	36.5	20.5	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	mb window (us)	-0.008	0.008	
ph/frq (deg)	11.8	7.1	Inc. seg. avg.	0.806	Sample rate(MISamp/s): 128		dr window (ns/s)	-0.011	0.011	
amp/frq (%)	16.8	12.4	Inc. frq. avg.	0.633	Data rate(Mb/s): 2048	nlags: 256	t_cohere infinite	ion window (TEC)	0.00	0.00

k: az 68.2 el 33.7 pa -71.5      o: az 68.8 el 30.5 pa -63.2      u,v (fr/asec) -172.923 -1086.793      simultaneous interpolator

Control file: cf\_1234\_gmva      Input file: /Exps/c201b/v1/1234/No0058/ko..18UHRL      Output file: /Exps/c201b/v1/1234/No0058/ko.W.102.18UHRL

Mk4/DiFX fourfit 3.19 rev 2512

J2025+33.18UHRL, No0058, ko  
VLBA\_KP - VLBA\_OV, fgroup W, pol LR



Fringe quality 0

SNR 7.0

Int time 175.754

Amp 0.192

Phase -3.7

PFD 4.6e-04

Delays (us)

SBD 0.002396

MBD 0.004029

Fringe rate (Hz)

0.005146

Ion TEC 0.000

Ref freq (MHz)

86140.0000

AP (sec) 0.512

Exp. c201b

Exper # 16383

Yr:day 2020:117

Start 090000.00

Stop 090300.22

FRT 090130.00

Corr/FF/build

2020:198:173855

2020:199:143657

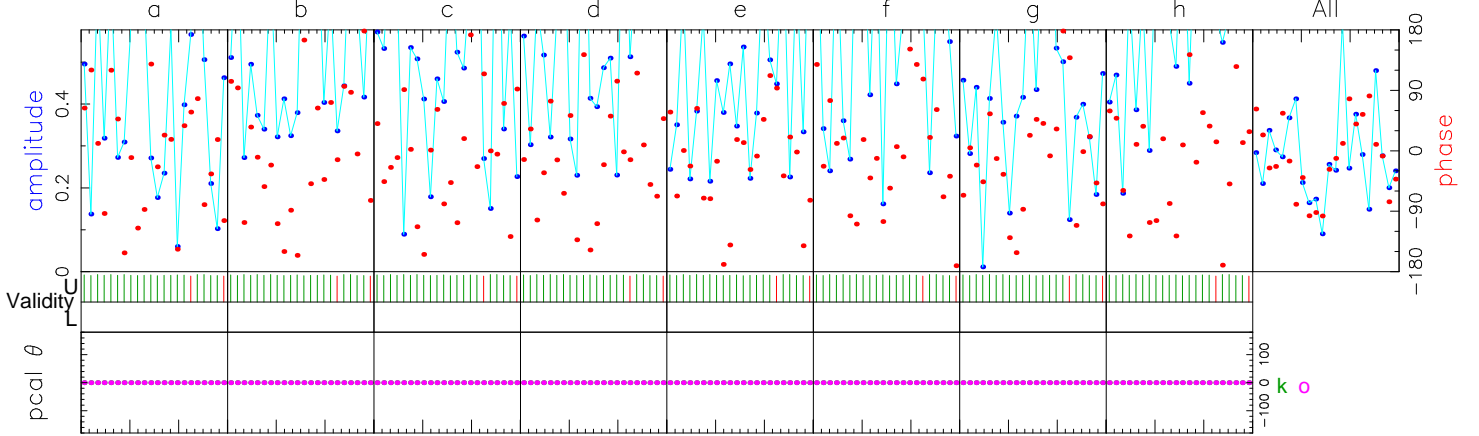
2020:014:135814

RA & Dec (J2000)

20h25m10.842106s

+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

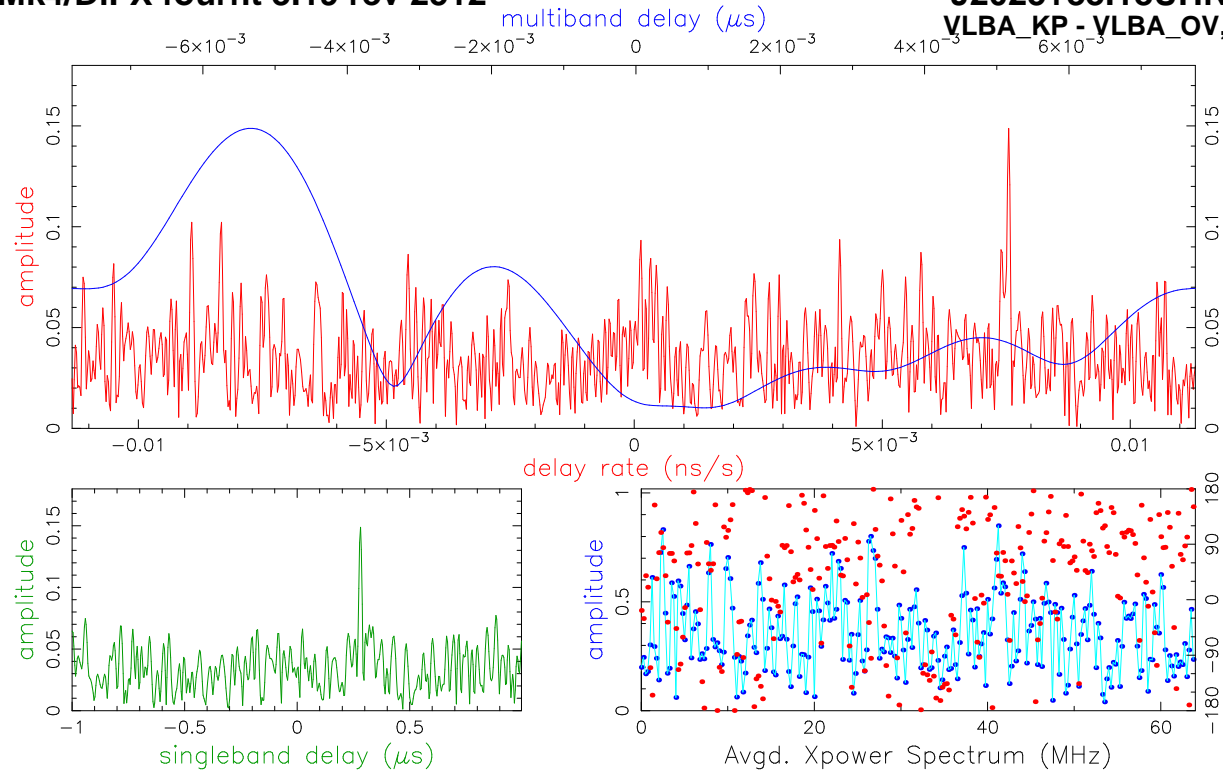


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	13.4	32.3	-24.2	-7.4	-13.2	-3.1	-8.0	9.9	Phase	-3.7
	0.1	0.1	0.2	0.2	0.2	0.2	0.2	0.3	Ampl.	0.2
	412.2	67.1	255.9	499.0	205.7	179.5	256.8	256.6	Sbd box	257.6
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
o	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:o	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:o	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Manl PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
o	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
o	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	9.86116656515E+02		Apriori delay (usec)		9.86112627522E+02		Resid mbdelay (usec)		4.02899E-03	+/- 1.6E-04
Sband delay (usec)	9.86115023522E+02		Apriori clock (usec)		-2.0434479E+01		Resid sbdelay (usec)		2.39600E-03	+/- 1.2E-03
Phase delay (usec)	9.86112627404E+02		Apriori clockrate (us/s)		-1.9560001E-07		Resid phdelay (usec)		-1.17882E-07	+/- 5.3E-07
Delay rate (us/s)	2.39028059981E-02		Apriori rate (us/s)		2.39027462582E-02		Resid rate (us/s)		5.97399E-08	+/- 5.1E-09
Total phase (deg)	260.9		Apriori accel (us/s/s)		-1.00984490377E-05		Resid phase (deg)		-3.7	+/- 16.4

	RMS	Theor.	Amplitude	0.192 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
ph/seg (deg)	55.9	38.5	Search (1024X32)	0.188	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.008	0.008
amp/seg (%)	74.3	67.3	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
ph/frq (deg)	19.6	23.2	Inc. seg. avg.	0.229	Sample rate(MISamp/s): 128		ion window (TEC)	0.00	0.00
amp/frq (%)	29.5	40.6	Inc. frq. avg.	0.181	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite			

k: az 68.2 el 33.7 pa -71.5 o: az 68.8 el 30.5 pa -63.2 u,v (fr/asec) -172.923 -1086.793 simultaneous interpolator

Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/ko..18UHRL Output file: /Exps/c201b/v1/1234/No0058/ko.W.117.18UHRL

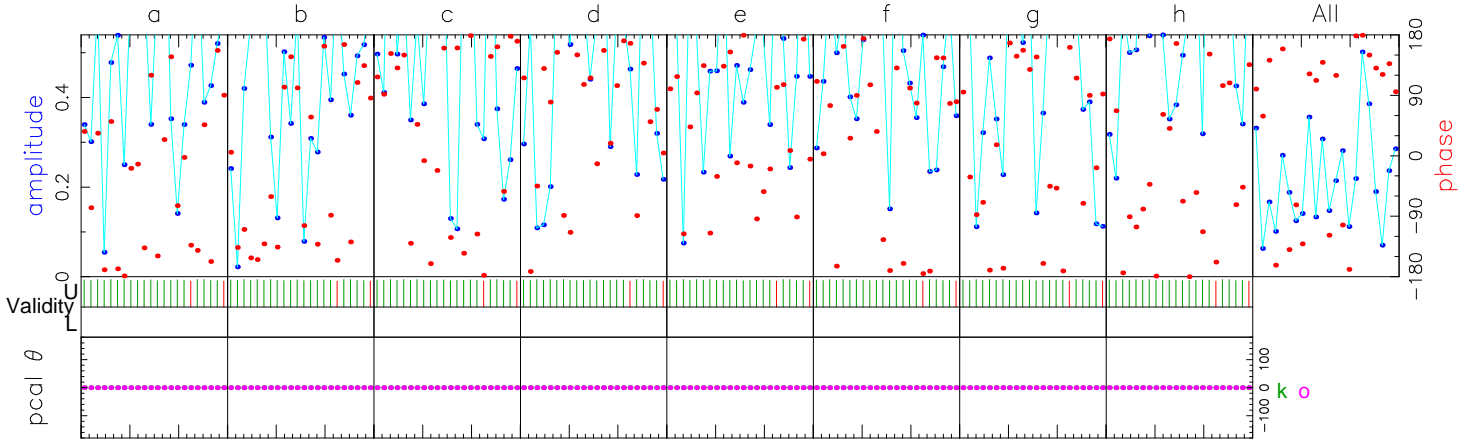


Fringe quality 0

SNR 5.4  
Int time 175.754  
Amp 0.180  
Phase 153.7  
PFD 1.0e+00  
Delays (us)  
SBD 0.280919  
MBD -0.005353  
Fringe rate (Hz) 0.650609  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143659  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

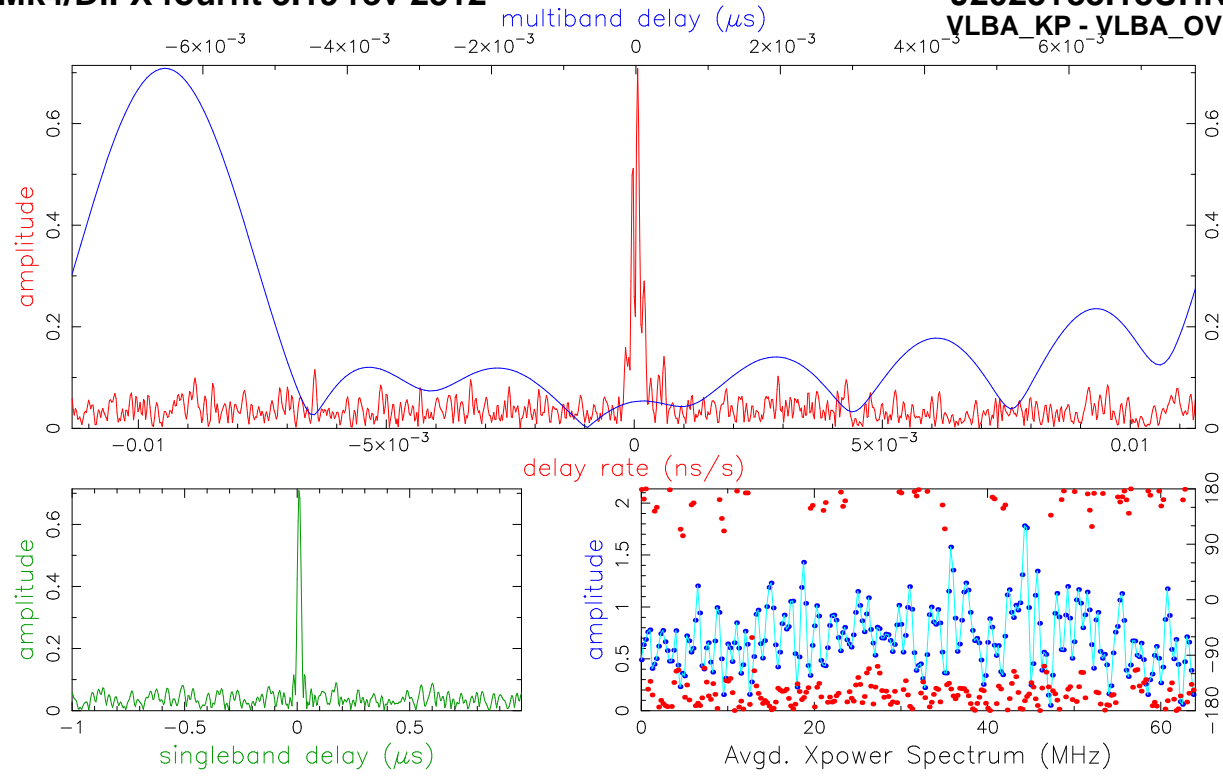
Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
o	1000	1000	1000	1000	1000	1000	1000	1000		
k:o	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:o	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
o	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
o	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
Group delay (usec)(sbd)	9.86388524047E+02					9.86112627522E+02			-5.35348E-03	+/- 2.0E-04
Sband delay (usec)	9.86393546522E+02					-2.0434479E+01			2.80919E-01	+/- 1.6E-03
Phase delay (usec)	9.86112632480E+02					-1.9560001E-07			4.95797E-06	+/- 6.8E-07
Delay rate (us/s)	2.39102991834E-02					2.39027462582E-02			7.55293E-06	+/- 6.6E-09
Total phase (deg)			58.3			-1.00984490377E-05			153.7	+/- 21.2
	RMS	Theor.	Amplitude	0.180 +/- 0.033		Pcal mode: MANUAL, MANUAL			PC period (AP's) 5, 5	
ph/seg (deg)	57.4	49.8	Search (1024X32)	0.147		Pcal rate: 0.000E+00, 0.000E+00 (us/s)			sb window (us)	-1.000 1.000
amp/seg (%)	87.0	86.9	Interp.	0.000		Bits/sample: 2x2			SampCntNorm: enabled	mb window (us) -0.008 0.008
ph/frq (deg)	56.7	30.0	Inc. seg. avg.	0.192		Sample rate(MISamp/s): 128				dr window (ns/s) -0.011 0.011
amp/frq (%)	60.7	52.4	Inc. frq. avg.	0.182		Data rate(Mb/s): 2048				ion window (TEC) 0.00 0.00

k: az 68.2 el 33.7 pa -71.5      o: az 68.8 el 30.5 pa -63.2      u,v (fr/asec) -172.923 -1086.793      simultaneous interpolator

Control file: cf\_1234\_gmva      Input file: /Exps/c201b/v1/1234/No0058/ko..18UHRL      Output file: /Exps/c201b/v1/1234/No0058/ko.W.128.18UHRL

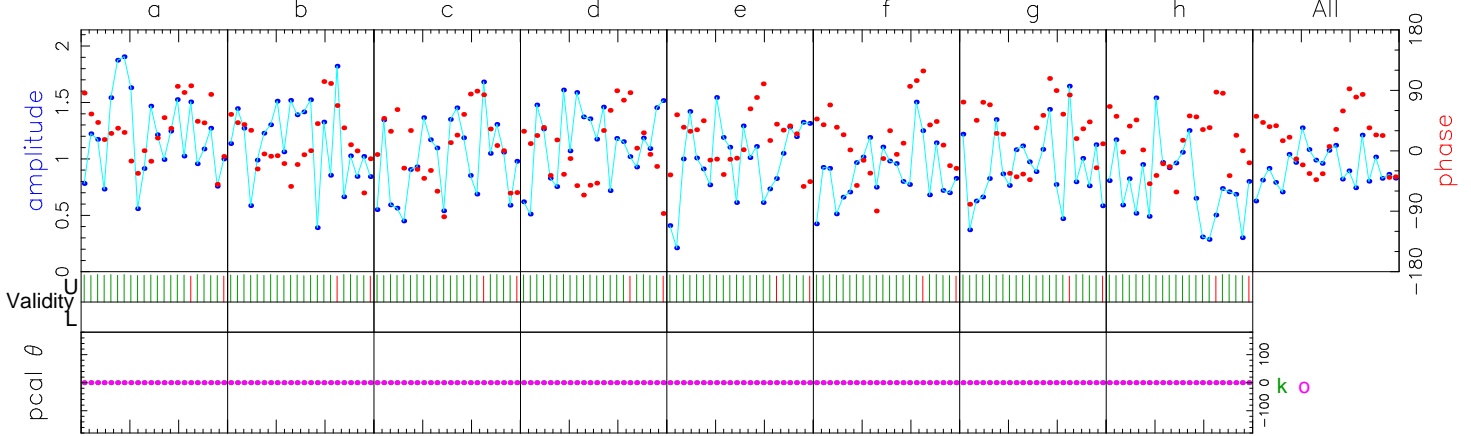


Fringe quality 8

SNR 25.9  
Int time 175.754  
Amp 0.715  
Phase 16.8  
PFD 0.0e+00  
Delays (us)  
SBD 0.009010  
MBD -0.006502  
Fringe rate (Hz) 0.005359  
Ion TEC 0.000  
Ref freq (MHz) 86140.0000  
AP (sec) 0.512

Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143653  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



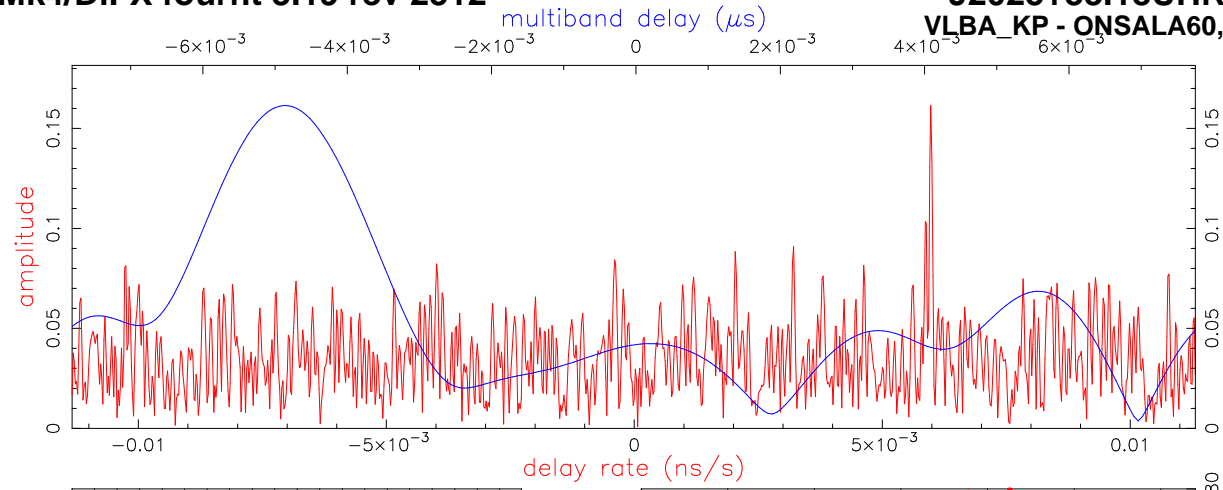
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
o	1000	1000	1000	1000	1000	1000	1000	1000		
k:o	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:o	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
o	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
o	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		

Group delay (usec)(sbd)	9.86121750890E+02	Apriori delay (usec)	9.86112627522E+02	Resid mbdelay (usec)	-6.50163E-03	+/-	4.2E-05
Sband delay (usec)	9.86121637272E+02	Apriori clock (usec)	-2.0434479E+01	Resid sbdelay (usec)	9.00975E-03	+/-	3.3E-04
Phase delay (usec)	9.86112628062E+02	Apriori clockrate (us/s)	-1.9560001E-07	Resid phdelay (usec)	5.40203E-07	+/-	1.4E-07
Delay rate (us/s)	2.39028084767E-02	Apriori rate (us/s)	2.39027462582E-02	Resid rate (us/s)	6.22184E-08	+/-	1.4E-09
Total phase (deg)	281.3	Apriori accel (us/s/s)	-1.00984490377E-05	Resid phase (deg)	16.8	+/-	4.4

	RMS	Theor.	Amplitude	0.715 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
ph/seg (deg)	40.6	10.4	Search (1024X32)	0.693	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.008	0.008
amp/seg (%)	37.0	18.1	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
ph/frq (deg)	13.8	6.3	Inc. seg. avg.	0.910	Sample rate(MISamp/s): 128		ion window (TEC)	0.00	0.00
amp/frq (%)	18.0	10.9	Inc. frq. avg.	0.721	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite			

k: az 68.2 el 33.7 pa -71.5      o: az 68.8 el 30.5 pa -63.2      u,v (fr/asec) -172.923 -1086.793      simultaneous interpolator

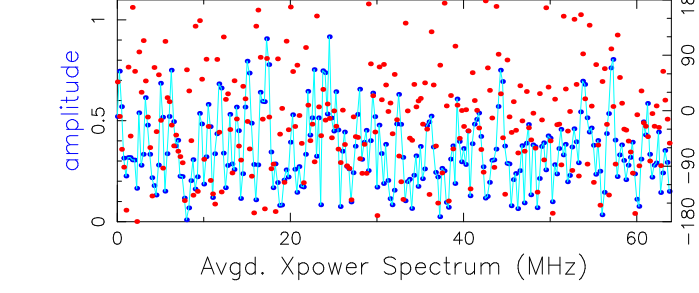
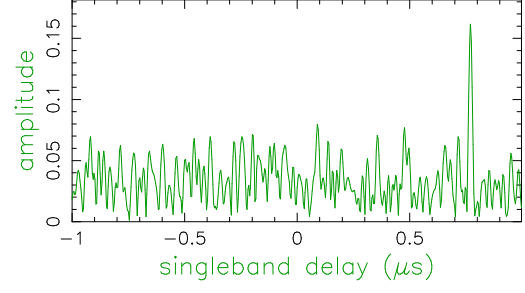
Control file: cf\_1234\_gmva      Input file: /Exps/c201b/v1/1234/No0058/ko..18UHRL      Output file: /Exps/c201b/v1/1234/No0058/ko.W.94.18UHRL



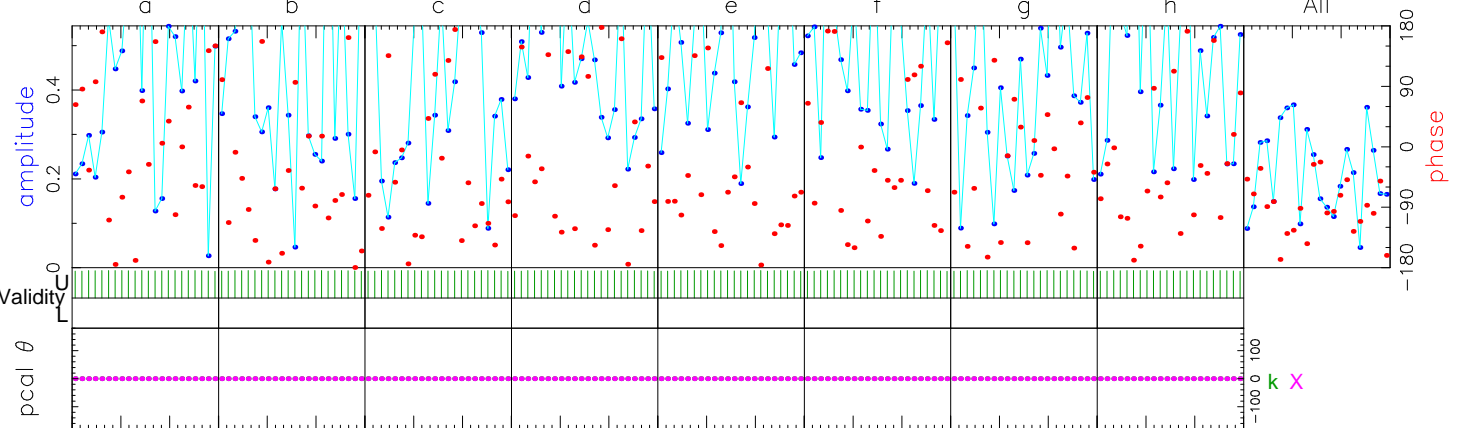
Fringe quality 0

SNR 5.9  
 Int time 178.593  
 Amp 0.182  
 Phase -94.7  
 PFD 3.7e-01  
 Delays (us)  
 SBD 0.769702  
 MBD -0.004861  
 Fringe rate (Hz)  
 0.514822  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512

Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090000.00  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143655  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

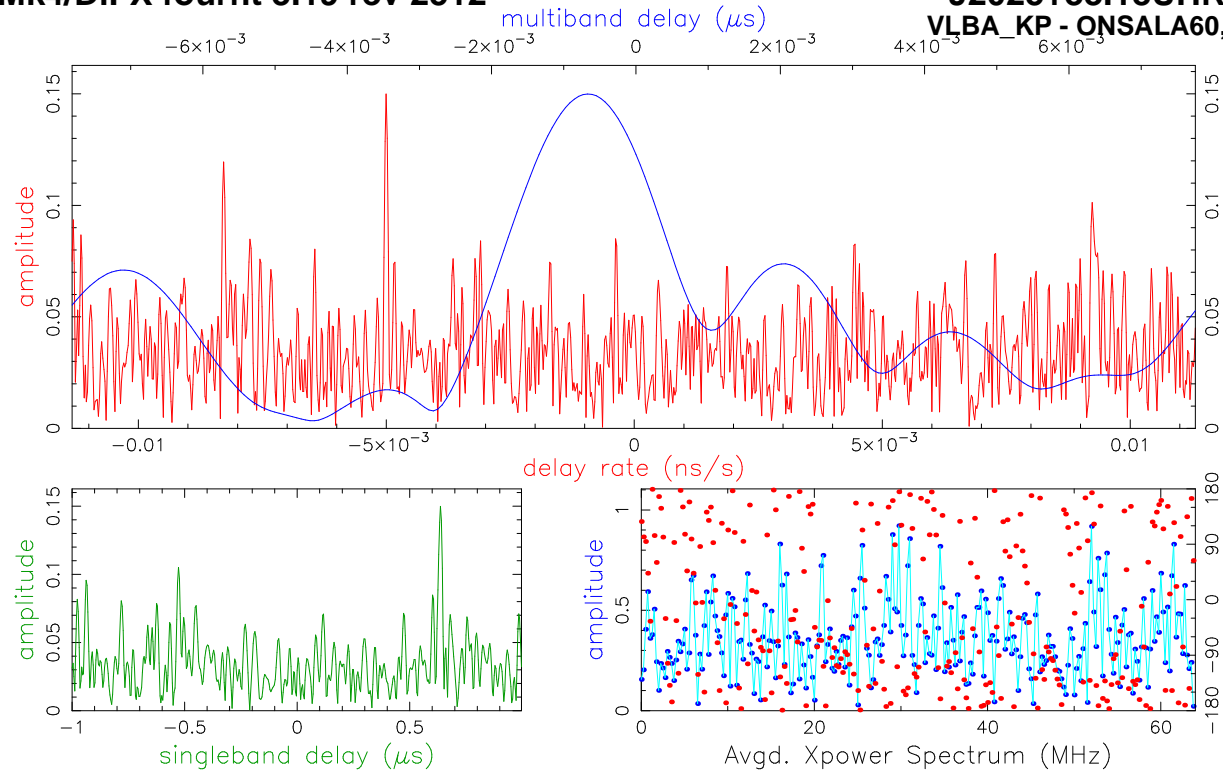


Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



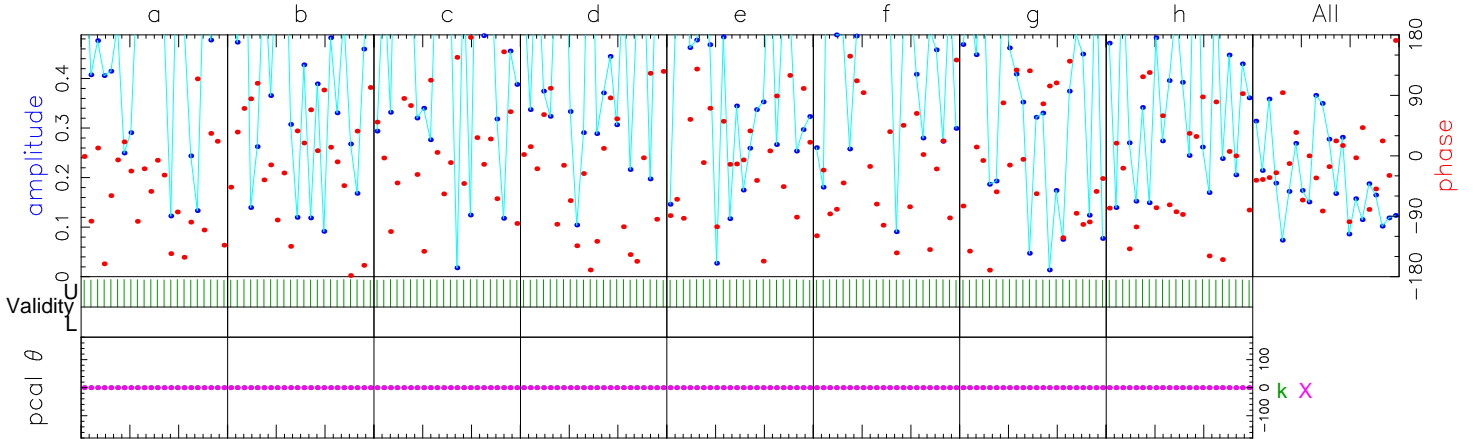
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-45.7	-96.2	-93.3	-131.7	-103.8	-114.2	-19.0	-97.8	Phase	-94.7
	0.1	0.3	0.2	0.2	0.3	0.2	0.2	0.2	Ampl.	0.2
	205.2	453.6	169.1	509.7	453.7	256.2	187.1	88.2	Sbd box	454.0
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
X	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:X	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:X	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
X	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
X	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-3.47720302866E+03		Apriori delay (usec)		-3.47797941790E+03		Resid mbdelay (usec)		-4.86075E-03	+/- 1.8E-04
Sband delay (usec)	-3.47720971615E+03		Apriori clock (usec)		-4.1110420E+01		Resid sbdelay (usec)		7.69702E-01	+/- 1.5E-03
Phase delay (usec)	-3.47797942096E+03		Apriori clockrate (us/s)		-5.2260003E-07		Resid phdelay (usec)		-3.05271E-06	+/- 6.3E-07
Delay rate (us/s)	1.58993727017E+00		Apriori rate (us/s)		1.58993129359E+00		Resid rate (us/s)		5.97658E-06	+/- 6.0E-09
Total phase (deg)			Apriori accel (us/s/s)		-1.37351330525E-06		Resid phase (deg)		-94.7	+/- 19.4

ph/seg (deg) 40.9 45.5 Search (1024X32) 0.160 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 68.1 79.5 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 40.8 27.5 Inc. seg. avg. 0.185 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 37.3 47.9 Inc. frq. avg. 0.186 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 k: az 68.2 el 33.7 pa -71.5 X: az 261.7 el 46.4 pa 39.8 u,v (fr/asec) -10959.030 -2318.498 ion window (TEC) 0.00 0.00  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kX..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kX.W.101.18UHRL simultaneous interpolator



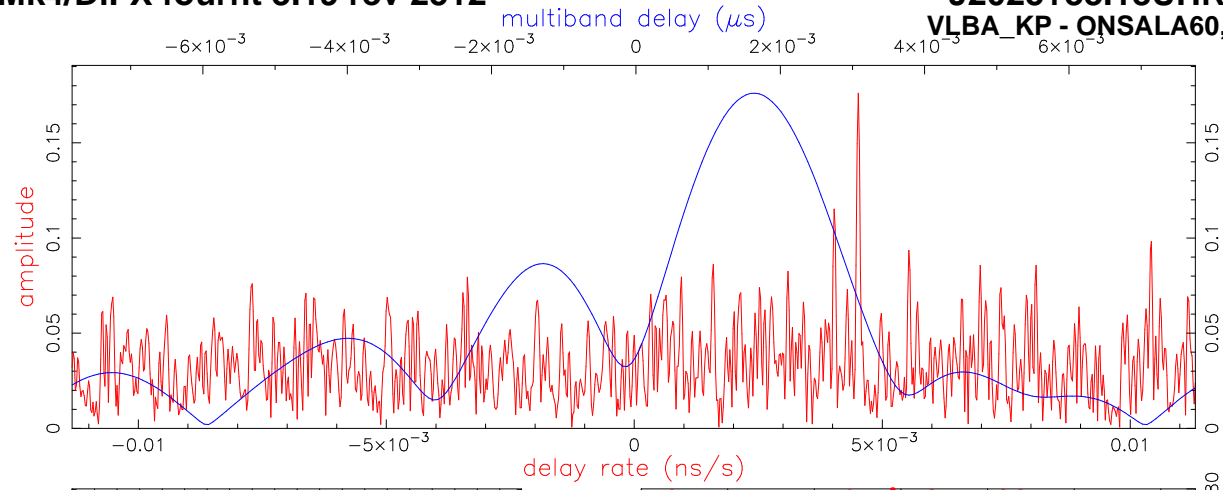
Fringe quality 0  
 SNR 5.5  
 Int time 178.593  
 Amp 0.163  
 Phase -24.5  
 PFD 9.9e-01  
 Delays (us)  
 SBD 0.637009  
 MBD -0.000657  
 Fringe rate (Hz)  
 -0.431336  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090000.00  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143657  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-47.6	3.6	-4.8	-44.3	3.3	-52.7	-40.4	-17.5	Phase	-24.5
	0.3	0.2	0.3	0.1	0.1	0.2	0.1	0.1	Ampl.	0.2
	417.8	252.7	222.8	163.6	57.3	121.7	56.3	203.2	Sbd box	420.1
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
X	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:X	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:X	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
X	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
X	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-3.47733944950E+03		Apriori delay (usec)		-3.47797941790E+03		Resid mbdelay (usec)		-6.56596E-04	+/- 2.0E-04
Sband delay (usec)	-3.47734240865E+03		Apriori clock (usec)		-4.1110420E-01		Resid sbdelay (usec)		6.37009E-01	+/- 1.6E-03
Phase delay (usec)	-3.47797941869E+03		Apriori clockrate (us/s)		-5.2260003E-07		Resid phdelay (usec)		-7.89284E-07	+/- 6.7E-07
Delay rate (us/s)	1.58992628621E+00		Apriori rate (us/s)		1.58993129359E+00		Resid rate (us/s)		-5.00738E-06	+/- 6.5E-09
Total phase (deg)			Apriori accel (us/s/s)		-1.37351330525E-06		Resid phase (deg)		-24.5	+/- 20.9

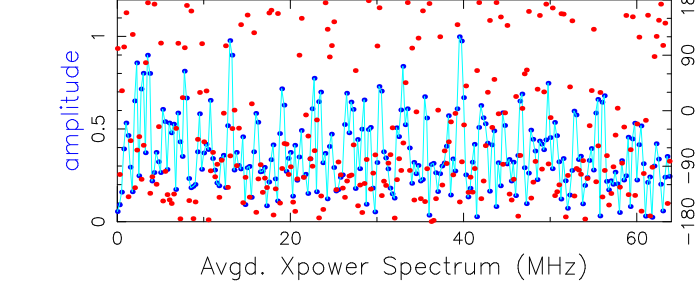
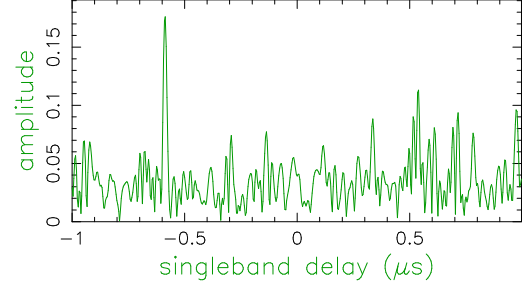
ph/seg (deg) 56.5 49.0 Search (1024X32) 0.146 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 67.9 85.6 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 25.7 29.6 Inc. seg. avg. 0.159 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 45.8 51.6 Inc. frq. avg. 0.156 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 k: az 68.2 el 33.7 pa -71.5 X: az 261.7 el 46.4 pa 39.8 u,v (fr/asec) -10959.030 -2318.498 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kX..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kX.W.114.18UHRL



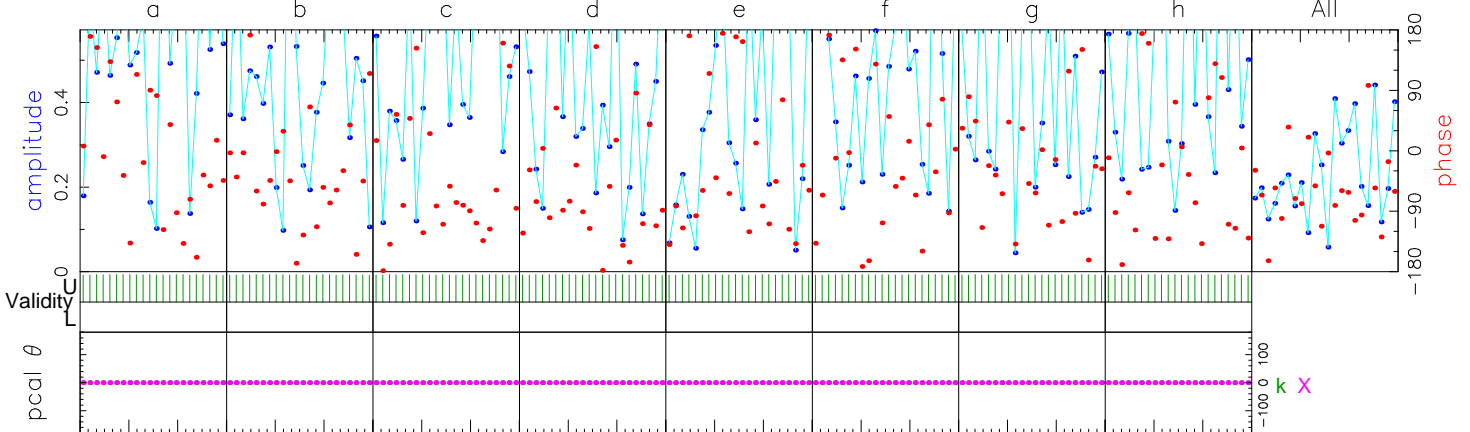
Fringe quality 0

SNR 6.5  
 Int time 178.593  
 Amp 0.191  
 Phase -67.3  
 PFD 9.9e-03  
 Delays (us)  
 SBD -0.587469  
 MBD 0.001652  
 Fringe rate (Hz) 0.389699  
 Ion TEC 0.000  
 Ref freq (MHz) 86140.0000  
 AP (sec) 0.512

Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090000.00  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143702  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

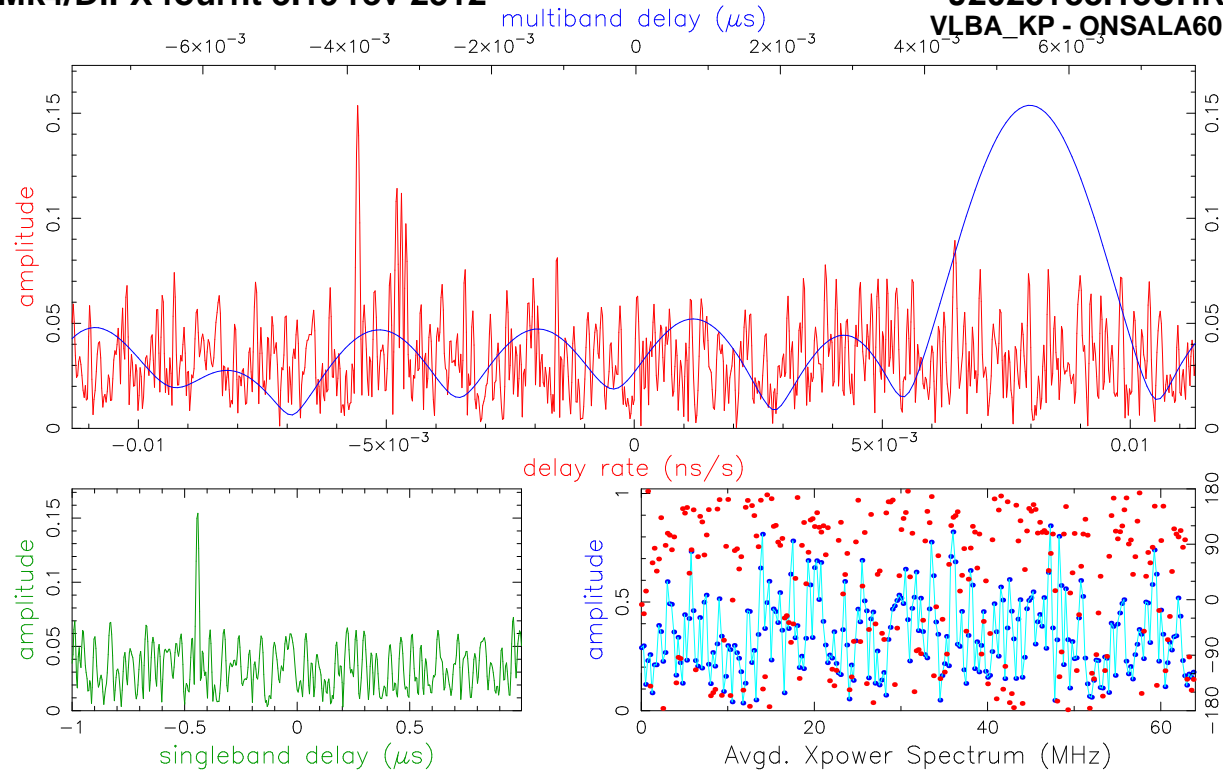


Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



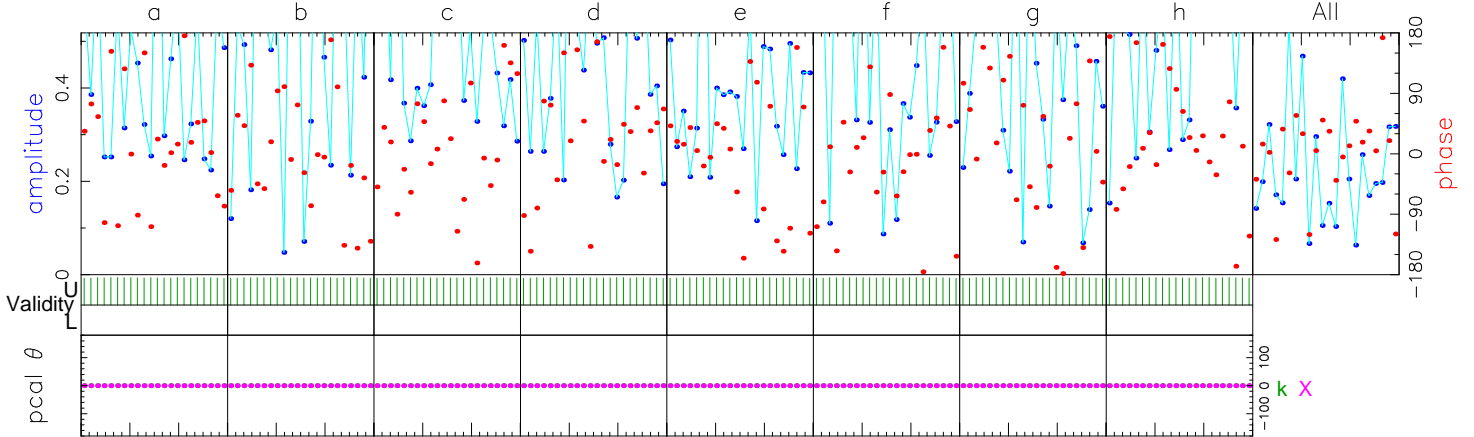
	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-61.1	-56.8	-84.3	-70.8	-87.9	-44.1	-39.0	-93.8	Phase	-67.3
	0.1	0.3	0.3	0.2	0.2	0.1	0.2	0.2	Ampl.	0.2
	457.3	107.5	506.4	138.7	195.0	398.0	356.2	278.1	Sbd box	106.6
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
X	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:X	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:X	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
X	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
X	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Tracks	
Group delay (usec)(sbd)	-3.47857151618E+03		Apriori delay (usec)		-3.47797941790E+03		Resid mbdelay (usec)		1.65172E-03	+/- 1.7E-04
Sband delay (usec)	-3.47856688640E+03		Apriori clock (usec)		-4.1110420E+01		Resid sbdelay (usec)		-5.87469E-01	+/- 1.3E-03
Phase delay (usec)	-3.47797942007E+03		Apriori clockrate (us/s)		-5.2260003E-07		Resid phdelay (usec)		-2.17045E-06	+/- 5.7E-07
Delay rate (us/s)	1.58993581762E+00		Apriori rate (us/s)		1.58993129359E+00		Resid rate (us/s)		4.52402E-06	+/- 5.4E-09
Total phase (deg)			Apriori accel (us/s/s)		-1.37351330525E-06		Resid phase (deg)		-67.3	+/- 17.6

ph/seg (deg) 57.6 41.2 Search (1024X32) 0.169 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 67.9 71.9 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 22.0 24.9 Inc. seg. avg. 0.199 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 30.4 43.4 Inc. frq. avg. 0.182 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 k: az 68.2 el 33.7 pa -71.5 X: az 261.7 el 46.4 pa 39.8 u,v (fr/asec) -10959.030 -2318.498 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kX..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kX.W.142.18UHRL



Fringe quality 0  
 SNR 5.7  
 Int time 178.593  
 Amp 0.173  
 Phase 4.2  
 PFD 7.7e-01  
 Delays (us)  
 SBD -0.442882  
 MBD 0.005426  
 Fringe rate (Hz)  
 -0.481487  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090000.00  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143652  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

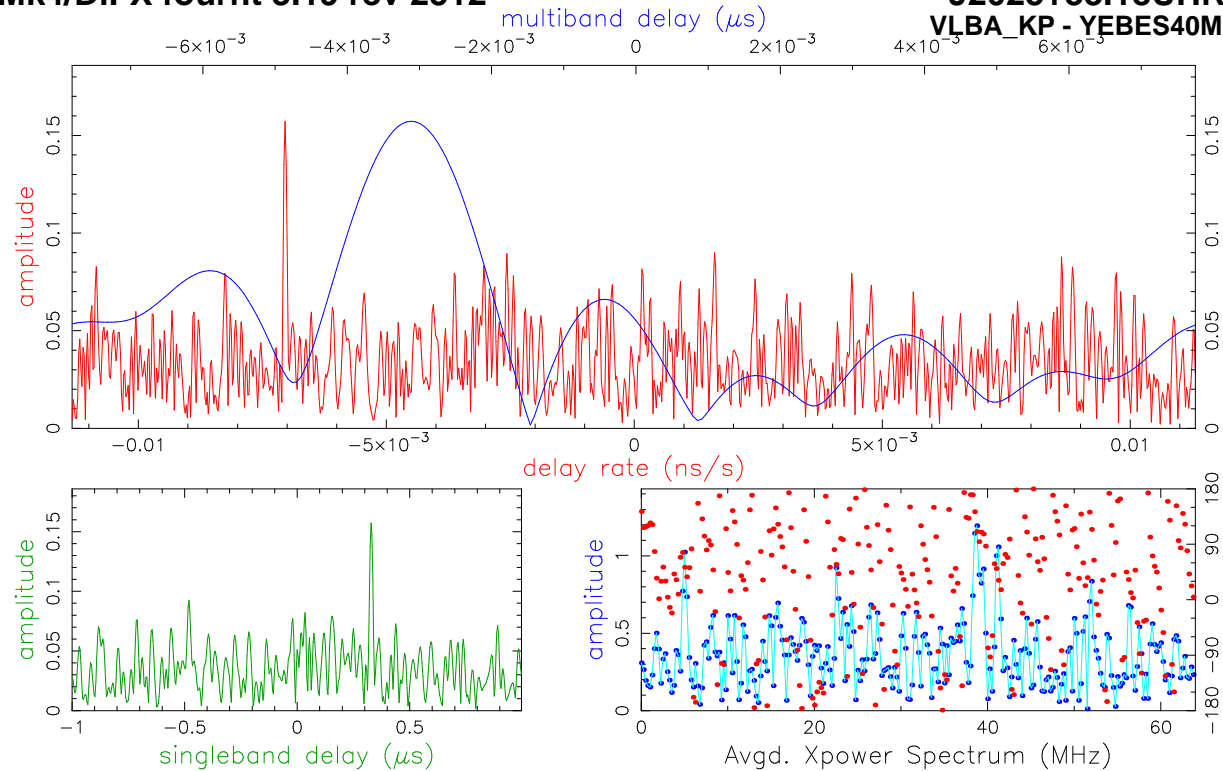
Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
X	1000	1000	1000	1000	1000	1000	1000	1000		
k:X	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:X	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
X	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
X	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
Group delay (usec)(sbd)	-3.47842711738E+03									
Sband delay (usec)	-3.47842229990E+03									
Phase delay (usec)	-3.47797941777E+03									
Delay rate (us/s)	1.58992570400E+00									
Total phase (deg)			-16.8							
Apriori delay (usec)										
Apriori clock (usec)										
Apriori clockrate (us/s)										
Apriori rate (us/s)										
Apriori accel (us/s/s)										
Resid mbdelay (usec)										
Resid sbdelay (usec)										
Resid phdelay (usec)										
Resid rate (us/s)										
Resid phase (deg)										

ph/seg (deg) 64.7 47.1 Search (1024X32) 0.151 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 92.5 82.3 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 13.0 28.4 Inc. seg. avg. 0.191 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 33.9 49.6 Inc. frq. avg. 0.154 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 k: az 68.2 el 33.7 pa -71.5 X: az 261.7 el 46.4 pa 39.8 u,v (fr/asec) -10959.030 -2318.498 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kX..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kX.W.93.18UHRL



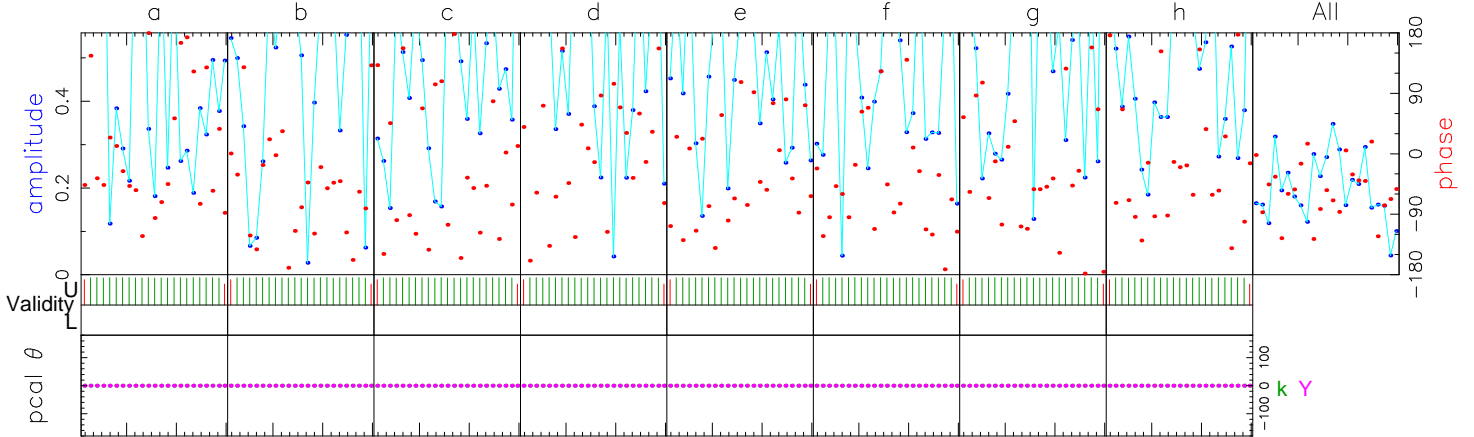


Fringe quality 0

SNR 5.7  
 Int time 173.026  
 Amp 0.186  
 Phase -56.8  
 PFD 8.3e-01  
 Delays (us)  
 SBD 0.328734  
 MBD -0.003097  
 Fringe rate (Hz)  
 -0.607965  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512

Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090005.12  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143700  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

Amp. and Phase vs. time for each freq., 23 segs, 15 APs / seg (7.68 sec / seg.), time ticks 10 sec

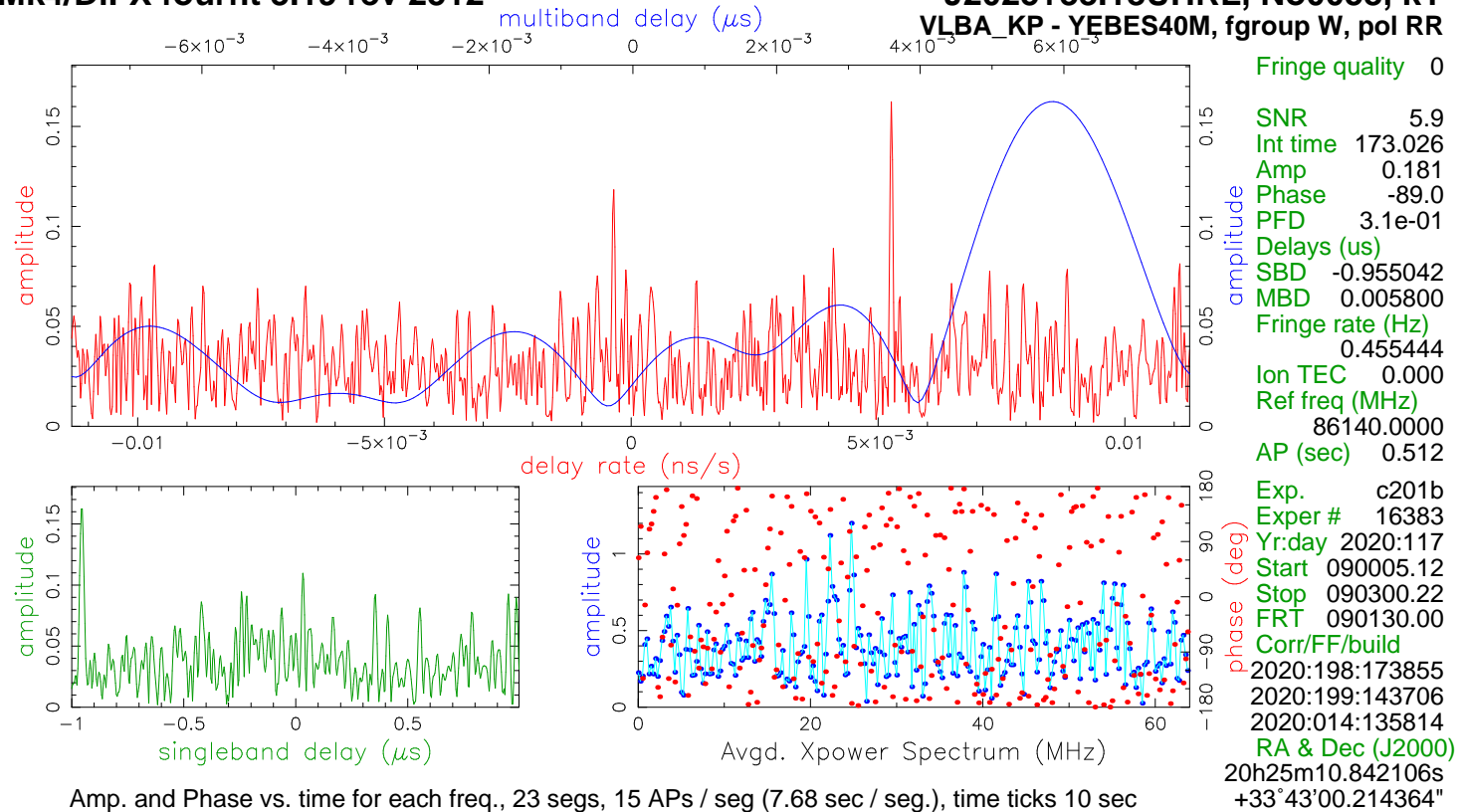


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-56.3	-57.3	-98.9	11.6	-26.7	-68.8	-69.7	-57.1	Phase	-56.8
	0.3	0.2	0.1	0.1	0.2	0.3	0.2	0.3	Ampl.	0.2
	298.5	417.6	132.6	348.6	427.5	342.9	384.6	253.1	Sbd box	341.2
U/L	342/0	342/0	342/0	342/0	342/0	342/0	342/0	342/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
Y	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:Y	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:Y	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
Y	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Chan ids	
Y	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Tracks	
Group delay (usec)(sbd)	-6.00124404069E+03		Apriori delay (usec)		-6.00156906861E+03		Resid mbdelay (usec)		-3.09708E-03	+/- 1.9E-04
Sband delay (usec)	-6.00124033511E+03		Apriori clock (usec)		-1.2317149E+01		Resid sbdelay (usec)		3.28734E-01	+/- 1.5E-03
Phase delay (usec)	-6.00156907044E+03		Apriori clockrate (us/s)		-2.1460000E-07		Resid phdelay (usec)		-1.83186E-06	+/- 6.5E-07
Delay rate (us/s)	1.65414844950E+00		Apriori rate (us/s)		1.65415550737E+00		Resid rate (us/s)		-7.05787E-06	+/- 6.4E-09
Total phase (deg)			Apriori accel (us/s/s)		2.42963518949E-05		Resid phase (deg)		-56.8	+/- 20.2

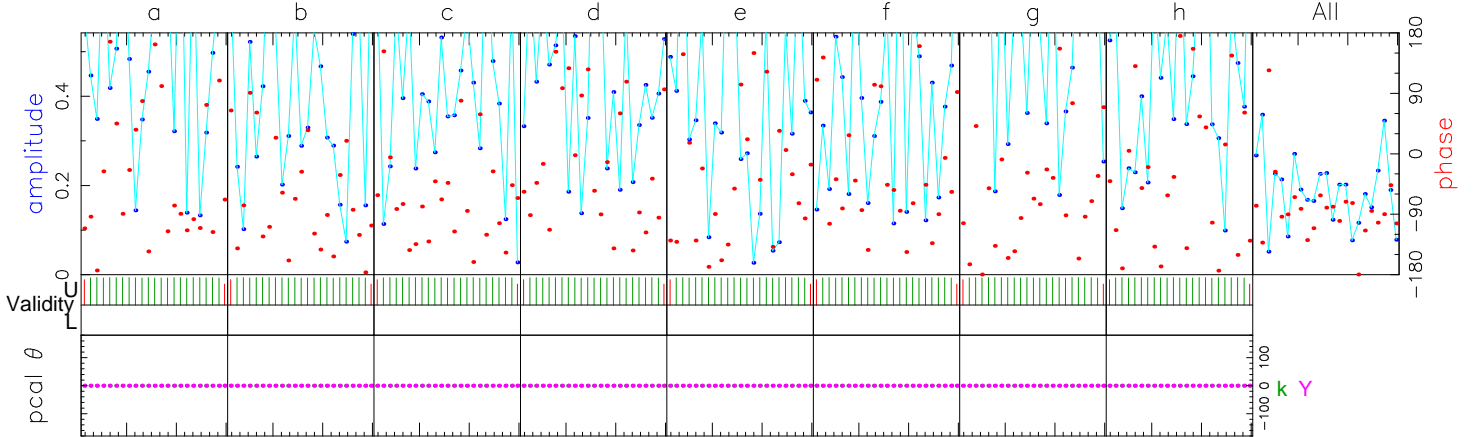
	RMS	Theor.	Amplitude	0.186 +/- 0.033	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
ph/seg (deg)	41.0	48.5	Search (1024X32)	0.155	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	SampCntNorm: enabled	mb window (us)	-0.008	0.008
amp/seg (%)	53.5	84.6	Interp.	0.000	Sample rate(MISamp/s): 128	nlags: 256	dr window (ns/s)	-0.011	0.011
ph/frq (deg)	35.8	28.6	Inc. seg. avg.	0.173	Data rate(Mb/s): 2048	t_cohere infinite	ion window (TEC)	0.00	0.00
amp/frq (%)	32.3	49.9	Inc. frq. avg.	0.181					

k: az 68.2 el 33.7 pa -71.5      Y: az 271.1 el 57.5 pa 66.0      u,v (fr/asec) -11380.536 452.688      simultaneous interpolator

Control file: cf\_1234\_gmva      Input file: /Exps/c201b/v1/1234/No0058/kY..18UHRL      Output file: /Exps/c201b/v1/1234/No0058/kY.W.131.18UHRL



Amp. and Phase vs. time for each freq., 23 segs, 15 APs / seg (7.68 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-103.1	-97.3	-85.5	-72.1	-90.8	-68.8	-80.4	-136.6	Phase	-89.0
	0.2	0.2	0.3	0.1	0.1	0.2	0.3	0.1	Ampl.	0.2
	272.2	274.1	12.9	330.6	217.0	113.9	12.3	108.9	Sbd box	12.5
U/L	342/0	342/0	342/0	342/0	342/0	342/0	342/0	342/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
Y	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:Y	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:Y	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
Y	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
Y	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-6.00251639371E+03		Apriori delay (usec)		-6.00156906861E+03		Resid mbdelay (usec)	5.79990E-03	+/-	1.8E-04
Sband delay (usec)	-6.00252411111E+03		Apriori clock (usec)		-1.2317149E+01		Resid sbdelay (usec)	-9.55042E-01	+/-	1.5E-03
Phase delay (usec)	-6.00156907147E+03		Apriori clockrate (us/s)		-2.1460000E-07		Resid phdelay (usec)	-2.86864E-06	+/-	6.2E-07
Delay rate (us/s)	1.65416079462E+00		Apriori rate (us/s)		1.65415550737E+00		Resid rate (us/s)	5.28725E-06	+/-	6.2E-09
Total phase (deg)		-294.0	Apriori accel (us/s/s)		2.42963518949E-05		Resid phase (deg)	-89.0	+/-	19.3

	RMS	Theor.	Amplitude	0.181 +/- 0.030	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
ph/seg (deg)	43.4	46.3	Search (1024X32)	0.160	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.008	0.008
amp/seg (%)	49.4	80.8	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
ph/frq (deg)	23.5	27.3	Inc. seg. avg.	0.157	Sample rate(MISamp/s): 128		ion window (TEC)	0.00	0.00
amp/frq (%)	37.3	47.7	Inc. frq. avg.	0.167	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite			

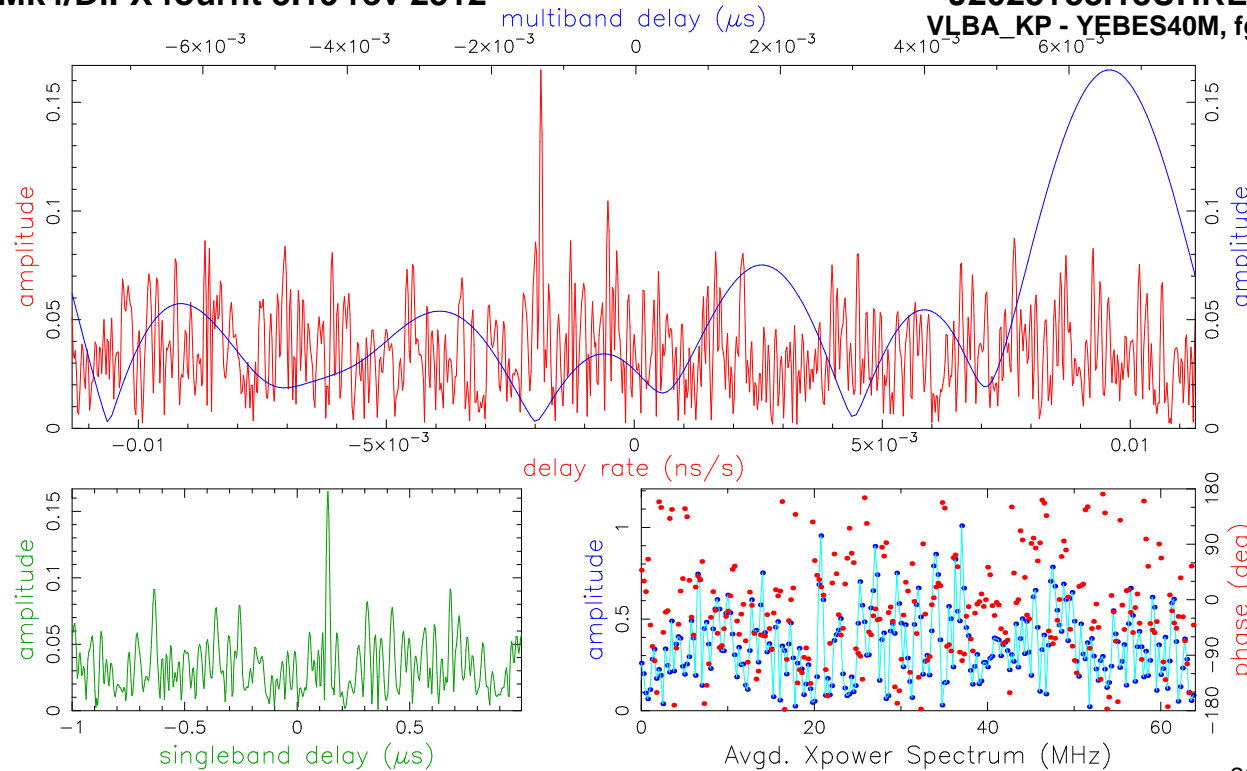
k: az 68.2 el 33.7 pa -71.5      Y: az 271.1 el 57.5 pa 66.0      u,v (fr/asec) -11380.536 452.688      simultaneous interpolator

Control file: cf\_1234\_gmva      Input file: /Exps/c201b/v1/1234/No0058/KY..18UHRL      Output file: /Exps/c201b/v1/1234/No0058/KY.W.166.18UHRL

Mk4/DiFX fourfit 3.19 rev 2512

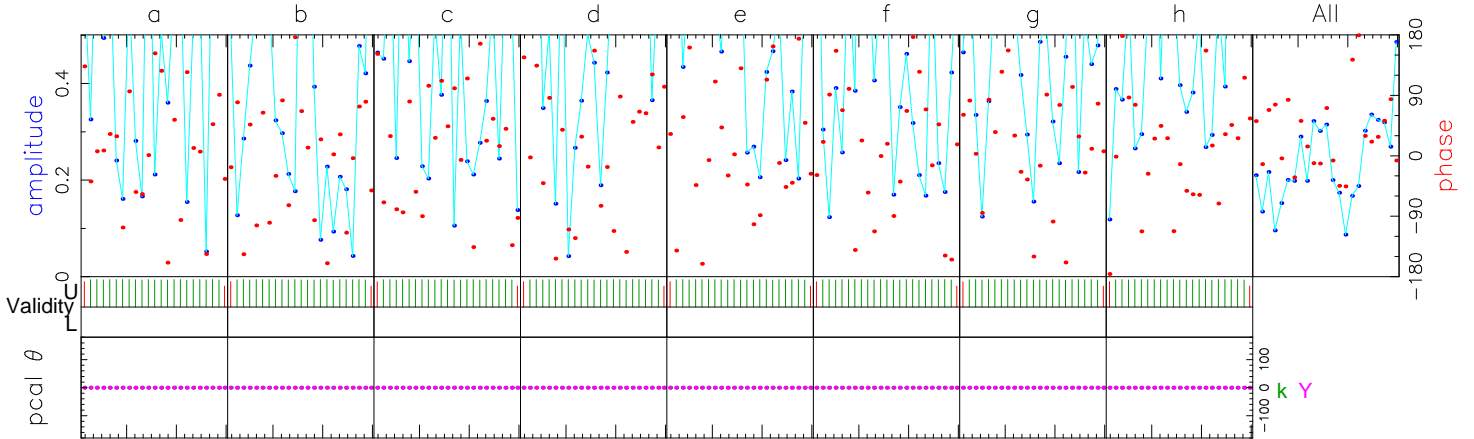
J2025+33.18UHRL, No0058, kY

VLBA\_KP - YEBES40M, fgroup W, pol LR



Fringe quality 0  
 SNR 5.9  
 Int time 173.026  
 Amp 0.167  
 Phase 27.9  
 PFD 3.1e-01  
 Delays (us)  
 SBD 0.136312  
 MBD 0.006556  
 Fringe rate (Hz)  
 -0.162998  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090005.12  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143708  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

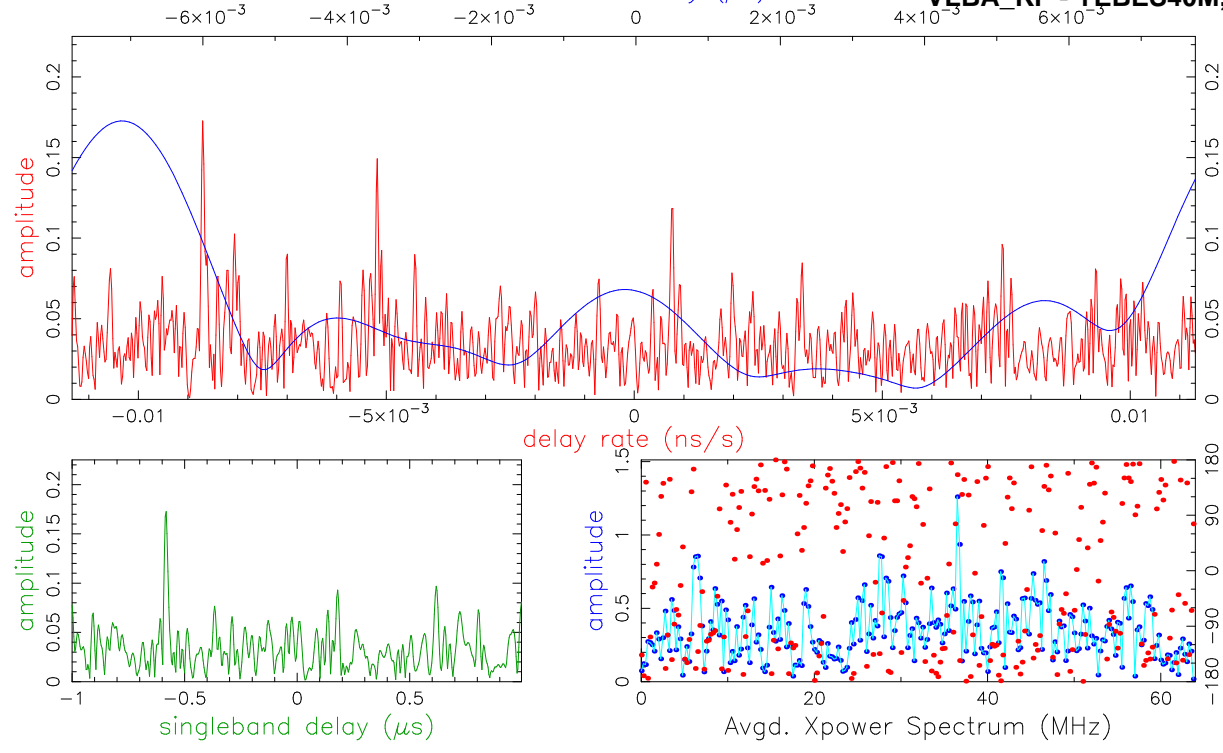
Amp. and Phase vs. time for each freq., 23 segs, 15 APs / seg (7.68 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	342/0	342/0	342/0	342/0	342/0	342/0	342/0	342/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Y	1000	1000	1000	1000	1000	1000	1000	1000		
k:Y	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:Y	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Y	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
Y	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
Group delay (usec)(sbd)	-6.00143751306E+03								6.55554E-03	+/- 1.8E-04
Sband delay (usec)	-6.00143275711E+03								1.36312E-01	+/- 1.5E-03
Phase delay (usec)	-6.00156906771E+03								8.98670E-07	+/- 6.2E-07
Delay rate (us/s)	1.65415361512E+00								-1.89225E-06	+/- 6.2E-09
Total phase (deg)			-177.2						27.9	+/- 19.3
Apriori delay (usec)										
Apriori clock (usec)										
Apriori clockrate (us/s)										
Apriori rate (us/s)										
Apriori accel (us/s/s)										
Resid mbdelay (usec)										
Resid sbdelay (usec)										
Resid phdelay (usec)										
Resid rate (us/s)										
Resid phase (deg)										
Pcal mode: MANUAL, MANUAL										
Pcal rate: 0.000E+00, 0.000E+00 (us/s)										
PC period (AP's) 5, 5										
sb window (us)									-1.000	1.000
mb window (us)									-0.008	0.008
dr window (ns/s)									-0.011	0.011
ion window (TEC)									0.00	0.00

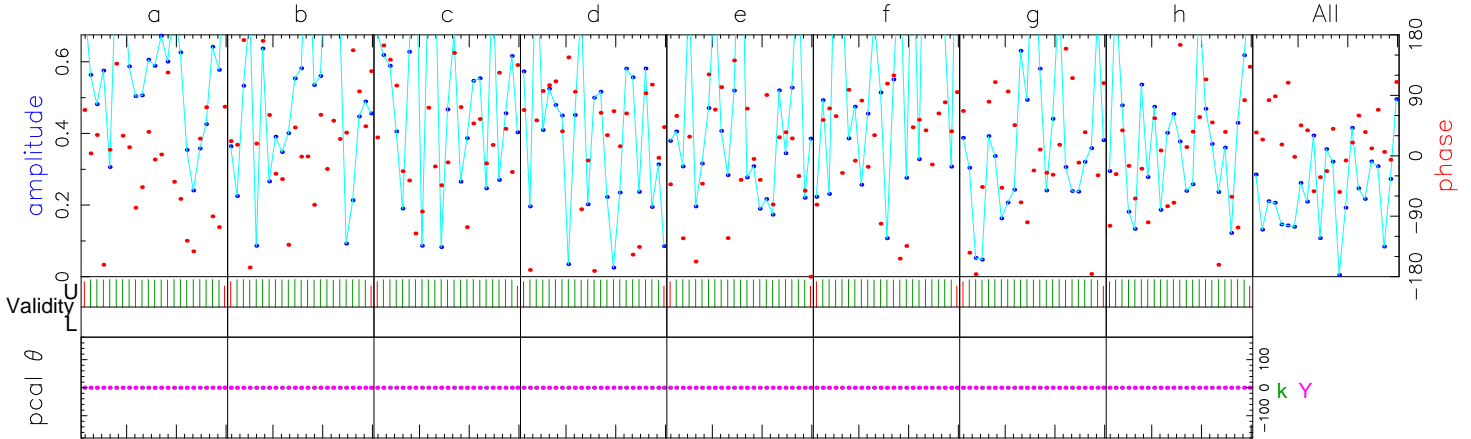
ph/seg (deg) 56.3 46.3 Search (1024X32) 0.156 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 68.6 80.8 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000  
 ph/frq (deg) 25.6 27.3 Inc. seg. avg. 0.180 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.008 0.008  
 amp/frq (%) 24.9 47.6 Inc. frq. avg. 0.162 Sample rate(MISamp/s): 128 Data rate(Mb/s): 2048 nlags: 256 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 k: az 68.2 el 33.7 pa -71.5 Y: az 271.1 el 57.5 pa 66.0 u,v (fr/asec) -11380.536 452.688 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kY..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kY.W.175.18UHRL

multiband delay ( $\mu$ s)



Fringe quality 0  
 SNR 6.3  
 Int time 173.026  
 Amp 0.225  
 Phase 29.8  
 PFD 4.7e-02  
 Delays (us)  
 SBD -0.583350  
 MBD -0.007151  
 Fringe rate (Hz)  
 -0.750068  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090005.12  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143710  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

Amp. and Phase vs. time for each freq., 23 segs, 15 APs / seg (7.68 sec / seg.), time ticks 10 sec

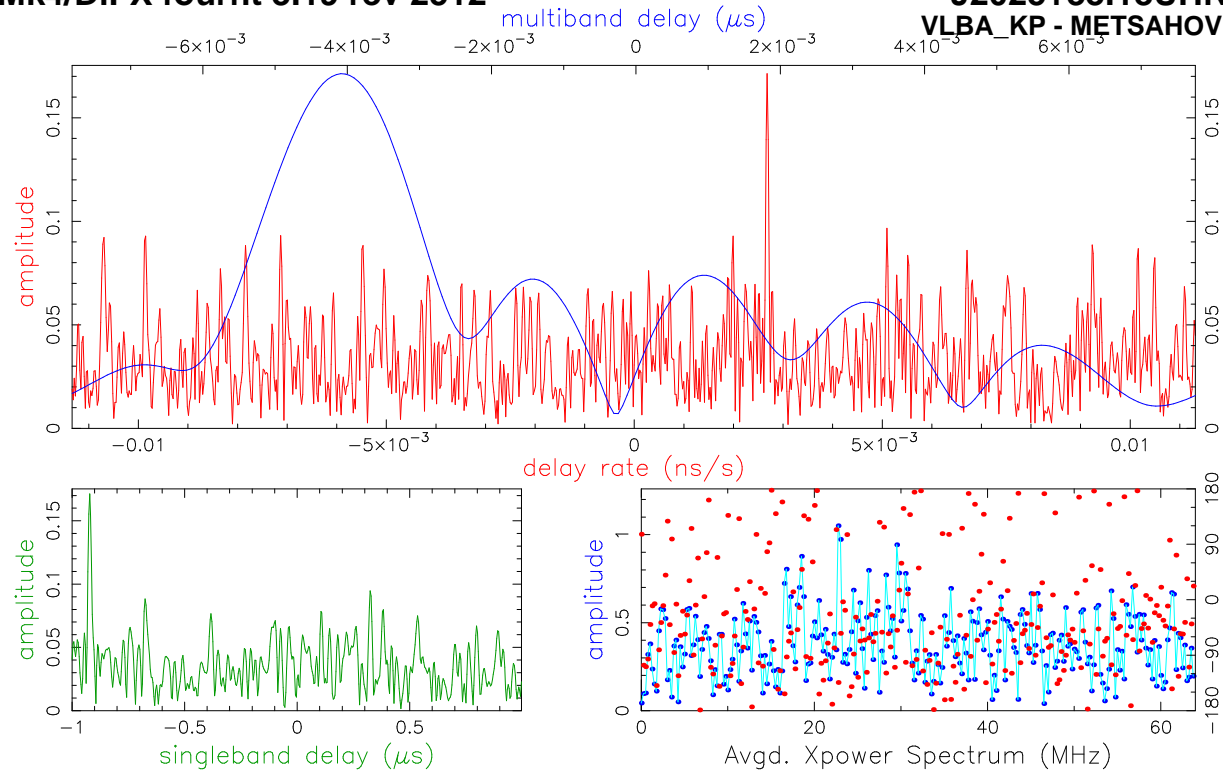


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	342/0	342/0	342/0	342/0	342/0	342/0	342/0	342/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Y	1000	1000	1000	1000	1000	1000	1000	1000		
k:Y	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:Y	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Y	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
Y	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		

Group delay (usec)(sbd)	-6.00215434438E+03	Apriori delay (usec)	-6.00156906861E+03	Resid mbdelay (usec)	-7.15077E-03	+/-	1.7E-04
Sband delay (usec)	-6.00215241836E+03	Apriori clock (usec)	-1.2317149E+01	Resid sbdelay (usec)	-5.83350E-01	+/-	1.4E-03
Phase delay (usec)	-6.00156906764E+03	Apriori clockrate (us/s)	-2.1460000E-07	Resid phdelay (usec)	9.60850E-07	+/-	5.9E-07
Delay rate (us/s)	1.65414679982E+00	Apriori rate (us/s)	1.65415550737E+00	Resid rate (us/s)	-8.70755E-06	+/-	5.8E-09
Total phase (deg)		Apriori accel (us/s/s)	2.42963518949E-05	Resid phase (deg)	29.8	+/-	18.3

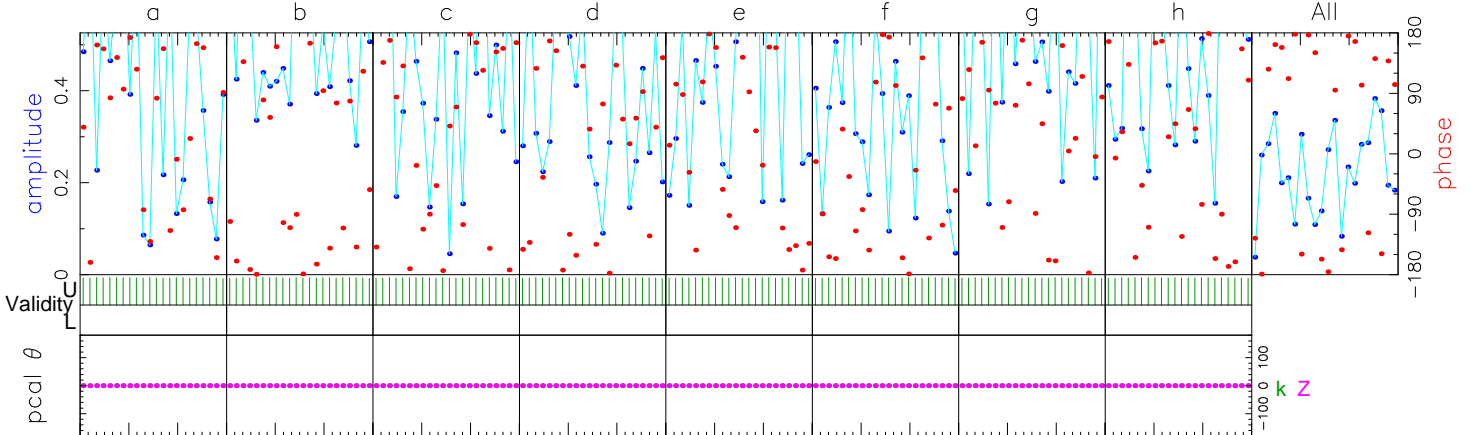
ph/seg (deg)	44.7	Theor.	43.8	Amplitude	0.225 +/- 0.036	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5
amp/seg (%)	72.7	Search (1024X32)	0.170	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		sb window (us)	-1.000 1.000
ph/frq (deg)	26.3	Inc. seg. avg.	0.235	Bits/sample: 2x2		mb window (us)	-0.008 0.008
amp/frq (%)	33.0	Inc. frq. avg.	0.219	Sample rate(MISamp/s): 128		dr window (ns/s)	-0.011 0.011
				Data rate(Mb/s): 2048		ion window (TEC)	0.00 0.00

k: az 68.2 el 33.7 pa -71.5 Y: az 271.1 el 57.5 pa 66.0 u,v (fr/asec) -11380.536 452.688 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c201b/v1/1234/No0058/kY..18UHRL Output file: /Exps/c201b/v1/1234/No0058/kY.W.188.18UHRL



Fringe quality 0  
 SNR 6.3  
 Int time 178.283  
 Amp 0.175  
 Phase 162.5  
 PFD 5.2e-02  
 Delays (us)  
 SBD -0.922023  
 MBD -0.004078  
 Fringe rate (Hz)  
 0.230605  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090000.00  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143700  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

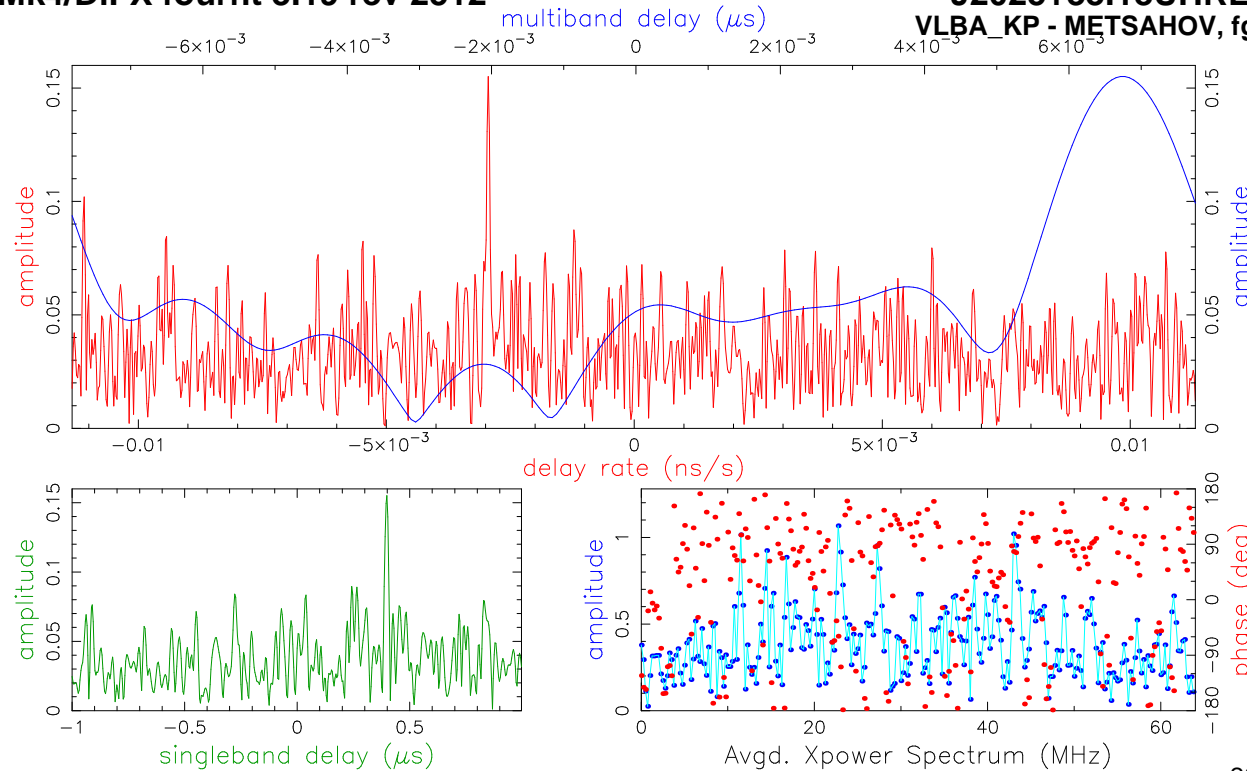
Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Z	1000	1000	1000	1000	1000	1000	1000	1000		
k:Z	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:Z	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Z	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		Chan ids
Z	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		Tracks

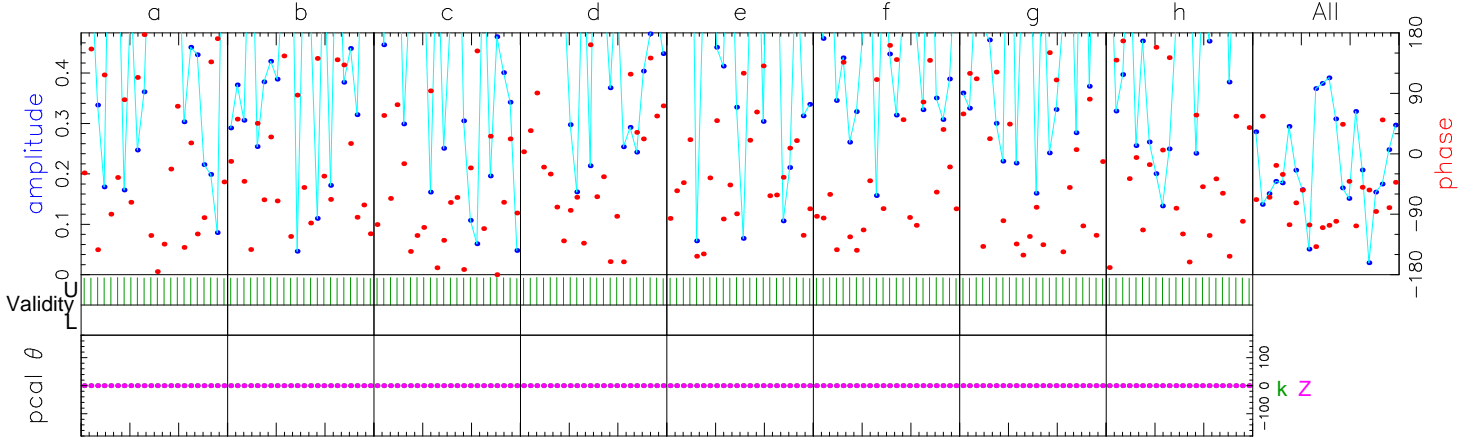
Group delay (usec)(sbd)	-1.63281614979E+03	Apriori delay (usec)	-1.63189019639E+03	Resid mbdelay (usec)	-4.07840E-03	+/-	1.7E-04
Sband delay (usec)	-1.63281221989E+03	Apriori clock (usec)	-2.2648919E-01	Resid sbdelay (usec)	-9.22023E-01	+/-	1.4E-03
Phase delay (usec)	-1.63189019115E+03	Apriori clockrate (us/s)	-1.0600001E-08	Resid phdelay (usec)	5.24093E-06	+/-	5.9E-07
Delay rate (us/s)	1.61082075850E+00	Apriori rate (us/s)	1.61081808140E+00	Resid rate (us/s)	2.67710E-06	+/-	5.7E-09
Total phase (deg)	-23.5	Apriori accel (us/s/s)	-1.25782090773E-05	Resid phase (deg)	162.5	+/-	18.3

ph/seg (deg)	42.2	Theor.	43.0	Search (1024X32)	0.170	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
amp/seg (%)	62.9		75.0	Interp.	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	SampCntNorm: enabled	mb window (us)	-0.008	0.008
ph/frq (deg)	31.0		25.9	Inc. seg. avg.	0.181	Bits/sample: 2x2	Sample rate(MISamp/s): 128	dr window (ns/s)	-0.011	0.011
amp/frq (%)	34.4		45.2	Inc. frq. avg.	0.176	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite	ion window (TEC)	0.00	0.00



Fringe quality 0  
SNR 5.7  
Int time 178.283  
Amp 0.160  
Phase -77.2  
PFD 8.1e-01  
Delays (us)  
SBD 0.397566  
MBD 0.006774  
Fringe rate (Hz)  
-0.253896  
Ion TEC 0.000  
Ref freq (MHz)  
86140.0000  
AP (sec) 0.512  
Exp. c201b  
Exper # 16383  
Yr:day 2020:117  
Start 090000.00  
Stop 090300.22  
FRT 090130.00  
Corr/FF/build  
2020:198:173855  
2020:199:143705  
2020:014:135814  
RA & Dec (J2000)  
20h25m10.842106s  
+33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec

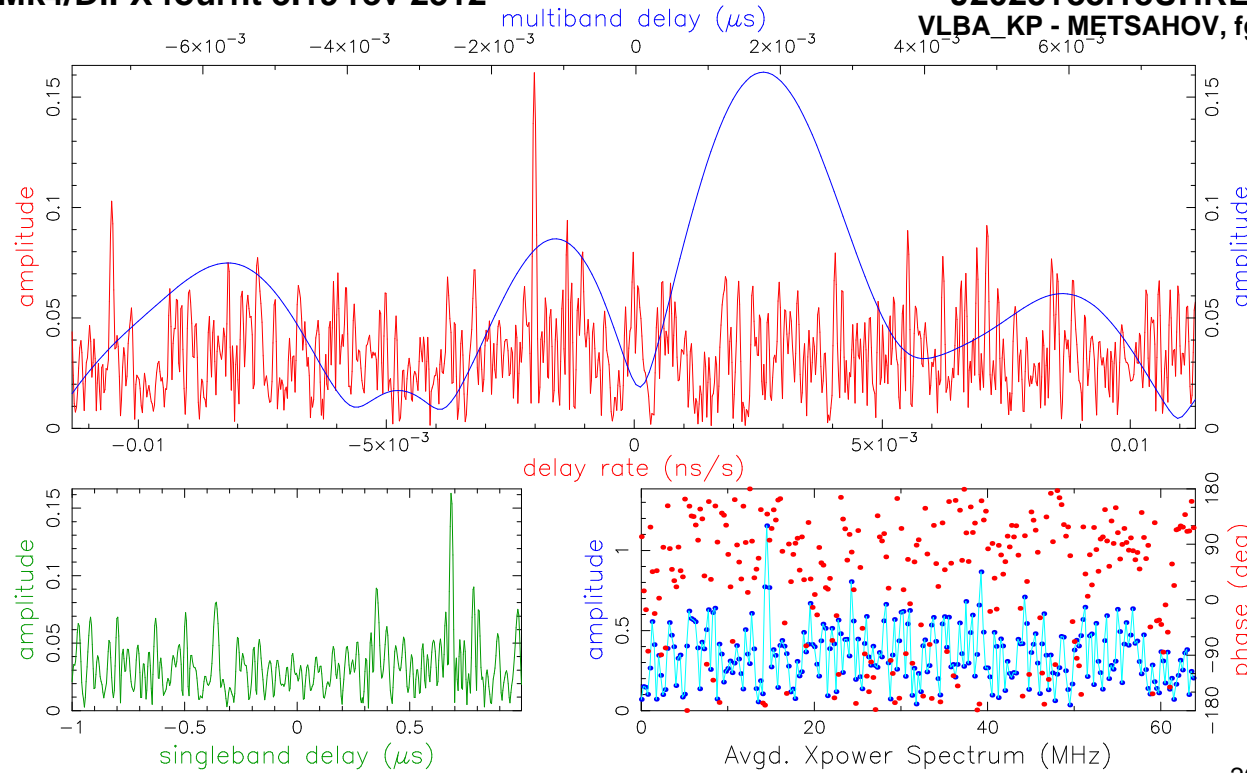


	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Z	1000	1000	1000	1000	1000	1000	1000	1000		
k:Z	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:Z	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Z	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		
Z	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		

Group delay (usec)(sbd)	-1.63149279730E+03	Apriori delay (usec)	-1.63189019639E+03	Resid mbdelay (usec)	6.77408E-03	+/-	1.9E-04
Sband delay (usec)	-1.63149263089E+03	Apriori clock (usec)	-2.2648919E-01	Resid sbdelay (usec)	3.97566E-01	+/-	1.5E-03
Phase delay (usec)	-1.63189019888E+03	Apriori clockrate (us/s)	-1.0600001E-08	Resid phdelay (usec)	-2.49080E-06	+/-	6.5E-07
Delay rate (us/s)	1.61081513392E+00	Apriori rate (us/s)	1.61081808140E+00	Resid rate (us/s)	-2.94748E-06	+/-	6.3E-09
Total phase (deg)	-263.3	Apriori accel (us/s/s)	-1.25782090773E-05	Resid phase (deg)	-77.2	+/-	20.2

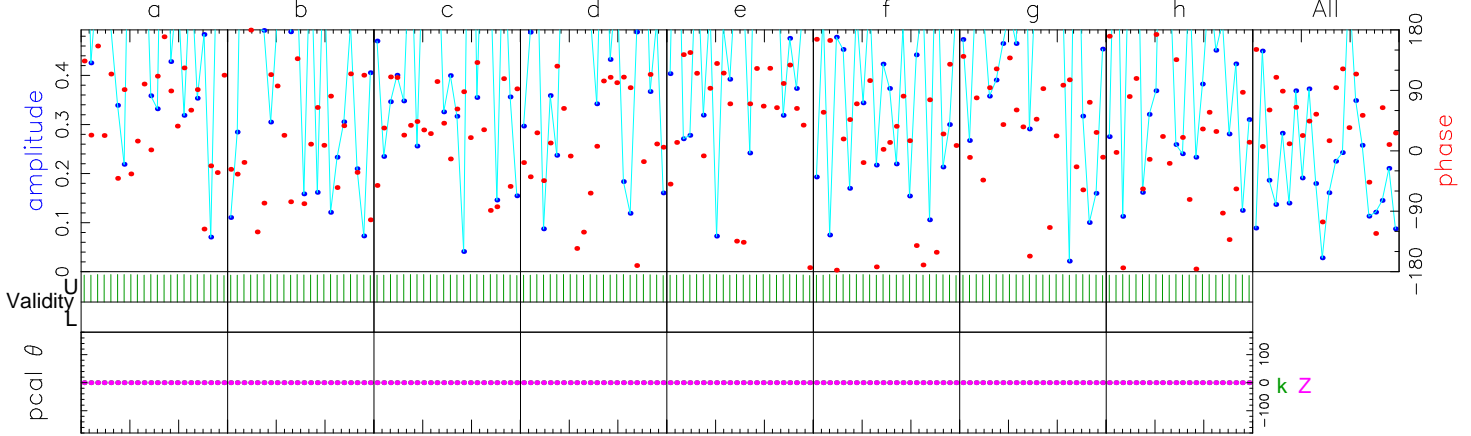
ph/seg (deg)	55.4	RMS	55.4	Theor.	47.3	Amplitude	0.160 +/- 0.028	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5	sb window (us)	-1.000	1.000
amp/seg (%)	75.5		75.5		82.6	Search (1024X32)	0.152	Pcal rate:	0.000E+00, 0.000E+00 (us/s)			mb window (us)	-0.008	0.008
ph/frq (deg)	34.0		34.0		28.5	Interp.	0.000	Bits/sample:	2x2	SampCntNorm:	enabled	dr window (ns/s)	-0.011	0.011
amp/frq (%)	36.7		36.7		49.8	Inc. seg. avg.	0.170	Sample rate (MSamp/s):	128			ion window (TEC)	0.00	0.00
						Inc. frq. avg.	0.162	Data rate (Mb/s):	2048	nlags:	256	t_cohere	infinite	

k: az 68.2 el 33.7 pa -71.5      Z: az 270.2 el 39.7 pa 36.7      u,v (fr/asec) -11111.264 -3094.789      simultaneous interpolator  
Control file: cf\_1234\_gmva    Input file: /Exps/c201b/v1/1234/No0058/kZ..18UHRL    Output file: /Exps/c201b/v1/1234/No0058/kZ.W.161.18UHRL



Fringe quality 0  
 SNR 5.9  
 Int time 178.283  
 Amp 0.164  
 Phase 53.0  
 PFD 3.3e-01  
 Delays (us)  
 SBD 0.684621  
 MBD 0.001818  
 Fringe rate (Hz)  
 -0.173552  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c201b  
 Exper # 16383  
 Yr:day 2020:117  
 Start 090000.00  
 Stop 090300.22  
 FRT 090130.00  
 Corr/FF/build  
 2020:198:173855  
 2020:199:143707  
 2020:014:135814  
 RA & Dec (J2000)  
 20h25m10.842106s  
 +33°43'00.214364"

Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Z	1000	1000	1000	1000	1000	1000	1000	1000		
k:Z	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k:Z	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0		
k	1000	1000	1000	1000	1000	1000	1000	1000		
Z	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL		
Z	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR		

Group delay (usec)(sbd)	-1.63120087856E+03	Apriori delay (usec)	-1.63189019639E+03	Resid mbdelay (usec)	1.81783E-03	+/-	1.8E-04
Sband delay (usec)	-1.63120557514E+03	Apriori clock (usec)	-2.2648919E-01	Resid sbdelay (usec)	6.84621E-01	+/-	1.5E-03
Phase delay (usec)	-1.63189019468E+03	Apriori clockrate (us/s)	-1.0600001E-08	Resid phdelay (usec)	1.71019E-06	+/-	6.2E-07
Delay rate (us/s)	1.61081606663E+00	Apriori rate (us/s)	1.61081808140E+00	Resid rate (us/s)	-2.01477E-06	+/-	6.0E-09
Total phase (deg)	-133.0	Apriori accel (us/s/s)	-1.25782090773E-05	Resid phase (deg)	53.0	+/-	19.3

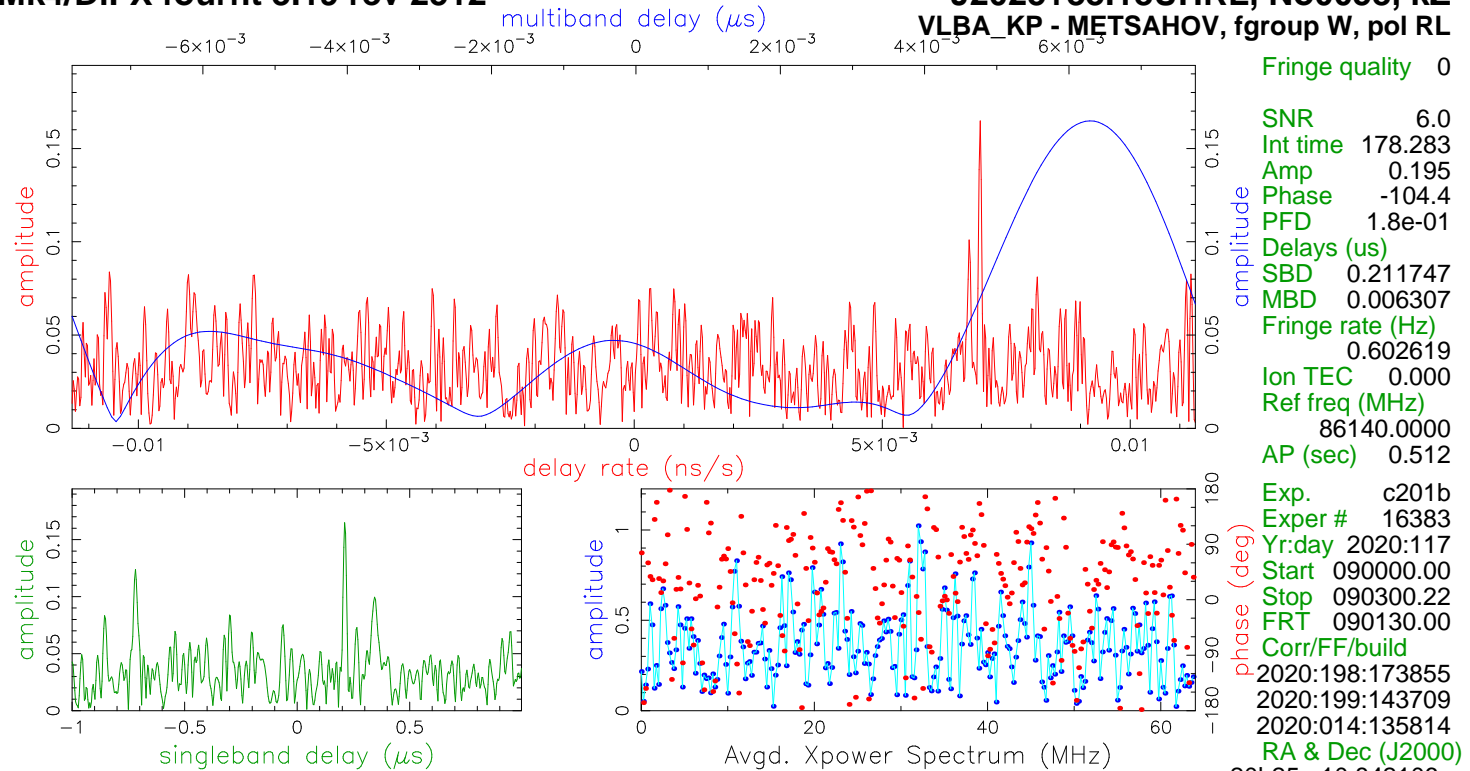
ph/seg (deg)	67.6	Theor.	45.4	Amplitude	0.164 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's)	5, 5
amp/seg (%)	89.3		79.2	Search (1024X32)	0.160	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000
ph/frq (deg)	36.3		27.4	Inc. seg. avg.	0.173	Bits/sample: 2x2	mb window (us)	-0.008 0.008
amp/frq (%)	43.1		47.8	Inc. frq. avg.	0.169	Sample rate(MISamp/s): 128	dr window (ns/s)	-0.011 0.011
						Data rate(Mb/s): 2048	ion window (TEC)	0.00 0.00
						nlags: 256	t_cohere infinite	

k: az 68.2 el 33.7 pa -71.5      Z: az 270.2 el 39.7 pa 36.7      u,v (fr/asec) -11111.264 -3094.789      simultaneous interpolator  
 Control file: cf\_1234\_gmva    Input file: /Exps/c201b/v1/1234/No0058/kZ..18UHRL    Output file: /Exps/c201b/v1/1234/No0058/kZ.W.170.18UHRL

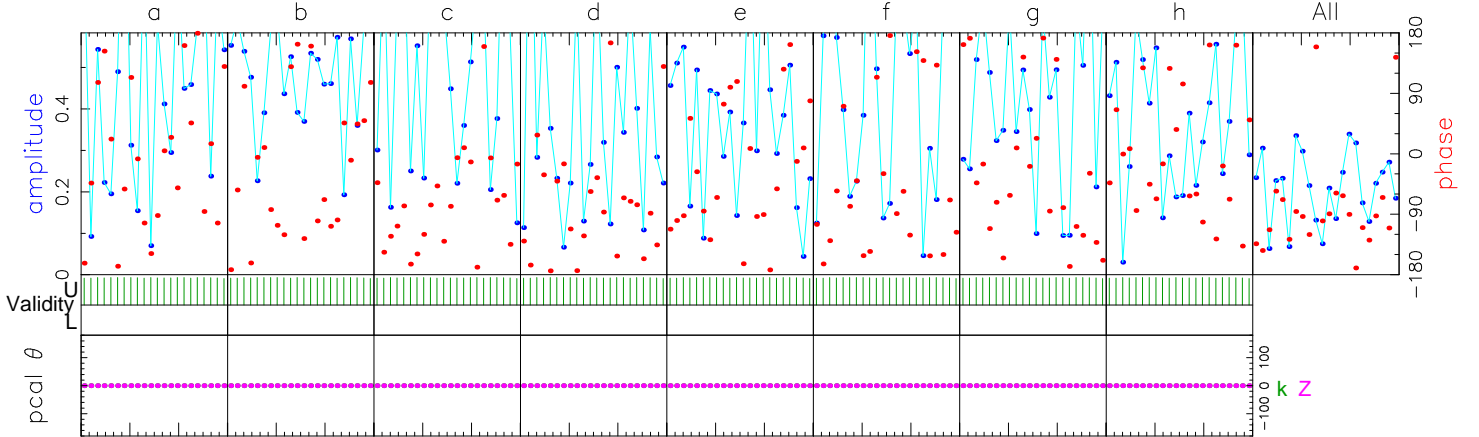
Mk4/DiFX fourfit 3.19 rev 2512

J2025+33.18UHRL, No0058, kZ

VLBA\_KP - METSAHOV, fgroup W, pol RL



Amp. and Phase vs. time for each freq., 22 segs, 16 APs / seg (8.19 sec / seg.), time ticks 10 sec



	86012.00	86076.00	86140.00	86204.00	86268.00	86332.00	86396.00	86460.00	Freq (MHz)	All
	-103.4	-114.5	-97.2	-102.3	-91.9	-127.2	-98.8	-87.7	Phase	-104.4
	0.1	0.1	0.4	0.2	0.1	0.3	0.2	0.1	Ampl.	0.2
	146.5	505.4	310.9	476.9	179.6	311.0	177.4	64.4	Sbd box	311.2
U/L	352/0	352/0	352/0	352/0	352/0	352/0	352/0	352/0	APs used	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
Z	1000	1000	1000	1000	1000	1000	1000	1000	PC freqs	
k:Z	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	PC phase	
k:Z	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	Mani PC	
k	1000	1000	1000	1000	1000	1000	1000	1000	PC amp	
Z	1000	1000	1000	1000	1000	1000	1000	1000		
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR	W06UR	W07UR	Chan ids	
Z	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL	W06UL	W07UL	Tracks	
									Chan ids	
									Tracks	
Group delay (usec)(sbd)	-1.63168076438E+03		Apriori delay (usec)	-1.63189019639E+03	Resid mbdelay (usec)	6.30700E-03	+/-	1.8E-04		
Sband delay (usec)	-1.63167844964E+03		Apriori clock (usec)	-2.2648919E-01	Resid sbdelay (usec)	2.11747E-01	+/-	1.4E-03		
Phase delay (usec)	-1.63189019975E+03		Apriori clockrate (us/s)	-1.0600001E-08	Resid phdelay (usec)	-3.36691E-06	+/-	6.1E-07		
Delay rate (us/s)	1.61082507721E+00		Apriori rate (us/s)	1.61081808140E+00	Resid rate (us/s)	6.99581E-06	+/-	5.9E-09		
Total phase (deg)		-290.4	Apriori accel (us/s/s)	-1.25782090773E-05	Resid phase (deg)	-104.4	+/-	19.0		

	RMS	Theor.	Amplitude	0.195 +/- 0.032	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
ph/seg (deg)	42.6	44.5	Search (1024X32)	0.162	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.008	0.008
amp/seg (%)	57.3	77.6	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
ph/frq (deg)	13.8	26.8	Inc. seg. avg.	0.191	Sample rate(MISamp/s): 128		ion window (TEC)	0.00	0.00
amp/frq (%)	44.8	46.8	Inc. frq. avg.	0.179	Data rate(Mb/s): 2048	nlags: 256 t_cohere infinite			

k: az 68.2 el 33.7 pa -71.5      Z: az 270.2 el 39.7 pa 36.7      u,v (fr/asec) -11111.264 -3094.789      simultaneous interpolator

Control file: cf\_1234\_gmva      Input file: /Exps/c201b/v1/1234/No0058/kZ..18UHRL      Output file: /Exps/c201b/v1/1234/No0058/kZ.W.182.18UHRL